

# **COMPONENT MAINTENANCE MANUAL WITH ILLUSTRATED PARTS LIST**

FOR:

## **289-801 SERIES PASSENGER OXYGEN MASK ASSEMBLIES**





### RECORD OF TEMPORARY REVISIONS

Keep this record in the front of this manual. When a temporary revision to this Component Maintenance Manual (CMM) is received, put the revision pages into this CMM and write in the revision number, revision date, date filed and your initials into the table below.

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## INTRODUCTION

### 1. Scope

This manual gives the user maintenance, overhaul and service procedures for the 289-801 Series Passenger Oxygen Mask Assemblies (PAX Masks) described herein.

This Component Maintenance Manual (CMM) provides the following information:

- A. Correct safety regulations that must be followed during the procedures given in this CMM.
- B. The correct sequence of operations that must be performed on the PAX Masks.
- C. Specifications and a list of the tools, equipment and materials for: maintenance, check, test and repair of the PAX Masks.

### 2. Warnings, Cautions and Notes

The Warnings, Cautions and Notes call attention to important information.

#### A. Warnings

Warnings call attention to the use of materials, processes, methods, procedures or limits which must be followed exactly to avoid personal injury or death.

#### B. Cautions

Cautions call attention to methods and procedures which must be followed to avoid damage to the PAX Masks or equipment.

#### C. Notes

Notes call attention to methods that make the job easier.

**WARNING: ANY SERVICE OR OVERHAUL PERFORMED ON THIS APPARATUS SHALL BE DONE ONLY BY THOSE FACILITIES EXPERIENCED IN, OR BY PERSONNEL KNOWLEDGEABLE IN, AVIATION OXYGEN EQUIPMENT. IF NONE IS KNOWN, CONTACT SCOTT AVIATION OR ITS DISTRIBUTORS FOR NAMES OF AUTHORIZED SERVICE CENTERS. IMPROPER USE OR IMPROPER MAINTENANCE OF THIS EQUIPMENT MAY RESULT IN SERIOUS PERSONAL INJURY OR DEATH.**



## 2. Warnings, Cautions and Notes (Continued)

**WARNING: ALL PROCEDURES DESCRIBED IN THIS MANUAL SHALL BE PERFORMED IN AN AREA FREE OF DUST, LINT, FINE METAL FILINGS, OIL, GREASE, FLAMMABLE SOLVENTS OR OTHER COMBUSTIBLE MATERIALS. THESE MATERIALS MAY CONTAMINATE THE PAX MASK AND CAUSE A MALFUNCTION RESULTING IN SERIOUS PERSONAL INJURY OR DEATH.**

**WARNING: SUITABLE EYE PROTECTION SHALL BE WORN TO PREVENT ACCIDENTAL EYE INJURIES.**

## 3. Product Support Services

Product support services for the PAX Masks shown in this CMM are provided by Scott Aviation. These services include repair and overhaul, replacement parts, and technical documentation.

Scott Aviation (Vendor Code 53655)  
A Figgie International Company  
225 Erie Street  
Lancaster, New York 14086-9502  
U.S.A

Telephone: 716-683-5100  
FAX: 716-681-1089

## 4. Verification

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Testing and Fault Isolation	Sep 22/97
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## 5. Abbreviations

#	Number
±	plus or minus
°C	temperature in degrees Celsius
°F	temperature in degrees Fahrenheit
***	end of attaching parts
ASSY	Assembly
BAC	The Boeing Co. (formerly Boeing Airplane Co.)
cc	cubic centimeters
cm	centimeters
CMM	Component Maintenance Manual
e.g.	example given
EFF.	Effectivity
EROS	Equipement Respiratoires a Oxygene de Secours
etc.	et cetera

## 5. Abbreviations (Continued)

FIG.	Figure
ft.	feet
ID	Identification
in.	inch
in•lbs	inch-pounds
in H <sub>2</sub> O	inches of Water (60 °F)
IPL	Illustrated Parts List
kg	kilograms
lpm	liters per minute
MDC	McDonnell Douglas Co.
mg	milligram
mil.	mil = 1/1000 inch
mm	millimeters
mm Hg	millimeters of mercury
MPa	megapascal
N	newton
N•m	newton meter
NHA	Next Higher Assembly
NO.	Number
NP	Not Procurable
NPT	National Pipe Thread
NTPD	Normal Temperature and Pressure Dry (70 °F / 21 °C, 760 mmHg, Dry)
OPT	optional
P/N	part number
Pa	pascal
PAX Masks	Passenger Oxygen Mask Assemblies
psi	pounds per square inch
psia	pounds per square inch absolute
psig	pounds per square inch gauge
QTY	quantity
REPLD	Replaced
REPLS	Replaces
REQ'D	Required
RF	Reference
slpm	standard liters per minute
SPN	Scott Part Number
TSO	Technical Standard Order



## DESCRIPTION AND OPERATION

### 1. General

This section of the manual describes the components and operation of the 289-801 Series Passenger Oxygen Mask Assemblies (PAX Masks). Refer to Figures 1 thru 7 for illustrations of the different types of PAX Masks.

### 2. Leading Particulars

The PAX Masks are qualified to TSO-C64a by the Federal Aviation Administration and agree with Aerospace Standard AS 8025 of the Society of Automotive Engineers, Incorporated. The Pax Masks have the following characteristics:

Basic Weight: .....2.00 ounces (56.7 grams) (Mask and bag with 12 inches (30.5 cm) of tubing).

(Note: PAX Mask weight will be different from basic weight when additional tubing and attaching parts are added.)

Storage Temperature: .....-70 to +160 °F (-57 to +71 °C).

Operating Altitude: .....Up to 40,000 feet (12,200 meters).

Minimum Service Life: .....3 Years

The dimensions of the PAX Masks in this CMM are given in Tables 1 thru 7. The indicator, bag & lanyard assembly are referred to as bag assembly. The definition of the dimensions that are used in Figures 1 thru 7 of this section are the following:

Dimension A: The length of the PAX Mask Assembly is measured from the end of the bag at the facepiece assembly (excluding the facepiece) to the end of the hose.

Dimension B: The length of the bag and tube assembly is measured from the end of the bag at the facepiece assembly to the midpoint of the flow indicator. If a dash(—) is used for this dimension, the flow indicator is an integral part of the reservoir bag.

Dimension C: The location of the lanyard attachment is measured from the end of the bag at the facepiece to the lanyard attachment point. If a dash ( — ) is used for this dimension, there is no lanyard assembly attached to the PAX Mask or the lanyard attaches to the facepiece assembly.

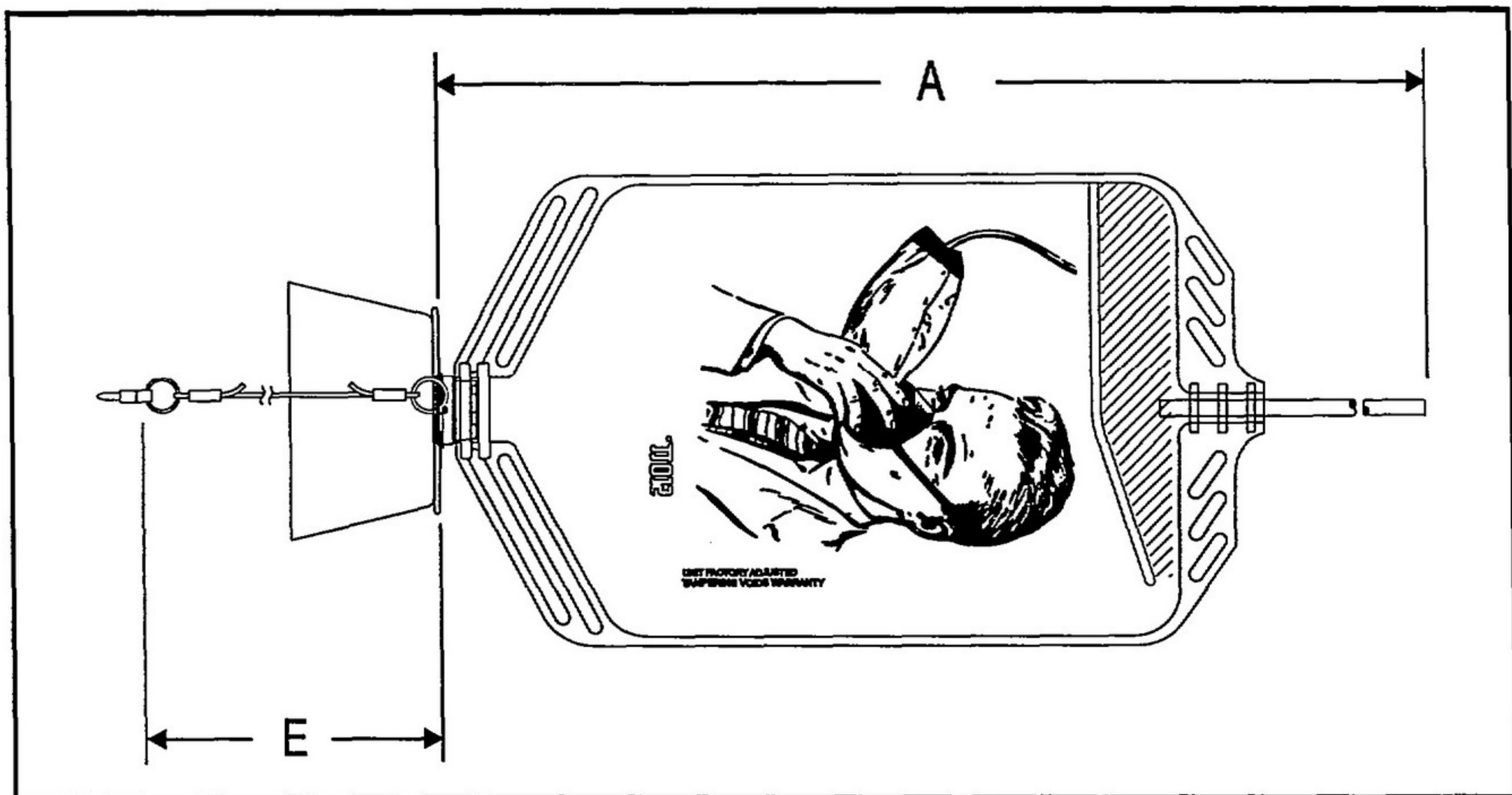
Dimension D: The length of the lanyard assembly that attaches to the tubing.

Dimension E: The length of the lanyard assembly that attaches to the facepiece assembly.

Dimension F: The length of the lanyard on the stringer that attaches to the ring.

NOTE: The dimensions in the subsequent tables are given with the tubing extended straight, unless noted differently.



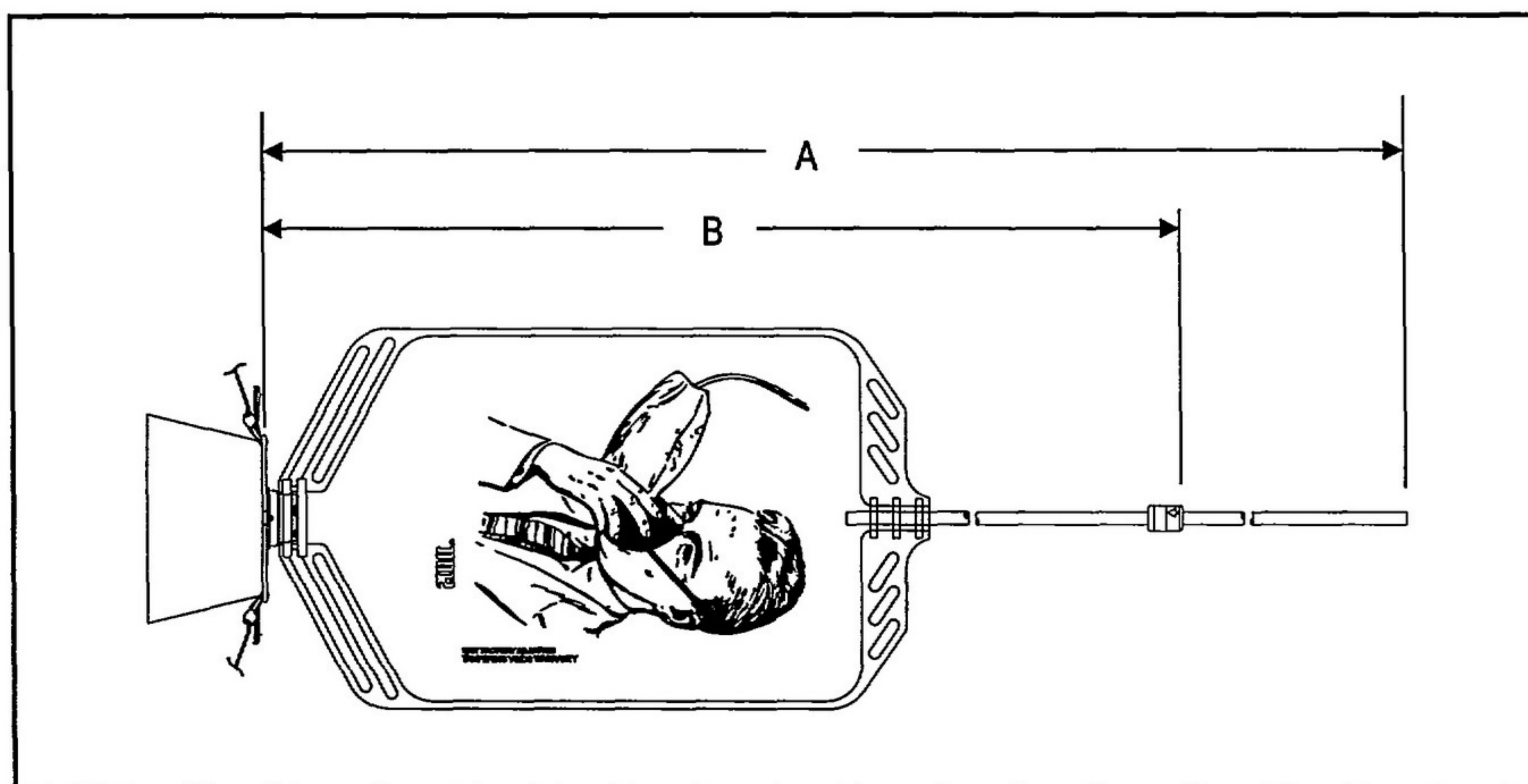


PAX Masks of IPL Figure 1  
Figure 1



Table 1  
Allowable Dimensions for PAX Masks of Figure 1

PAX MASK PART NUMBER	DIMENSION (in / cm)	
	A (± 2.00 in. / 5.1 cm)	E (± 0.25 in. / 0.6 cm)
289-801-50	42.00 / 106.7	10.00 / 25.4

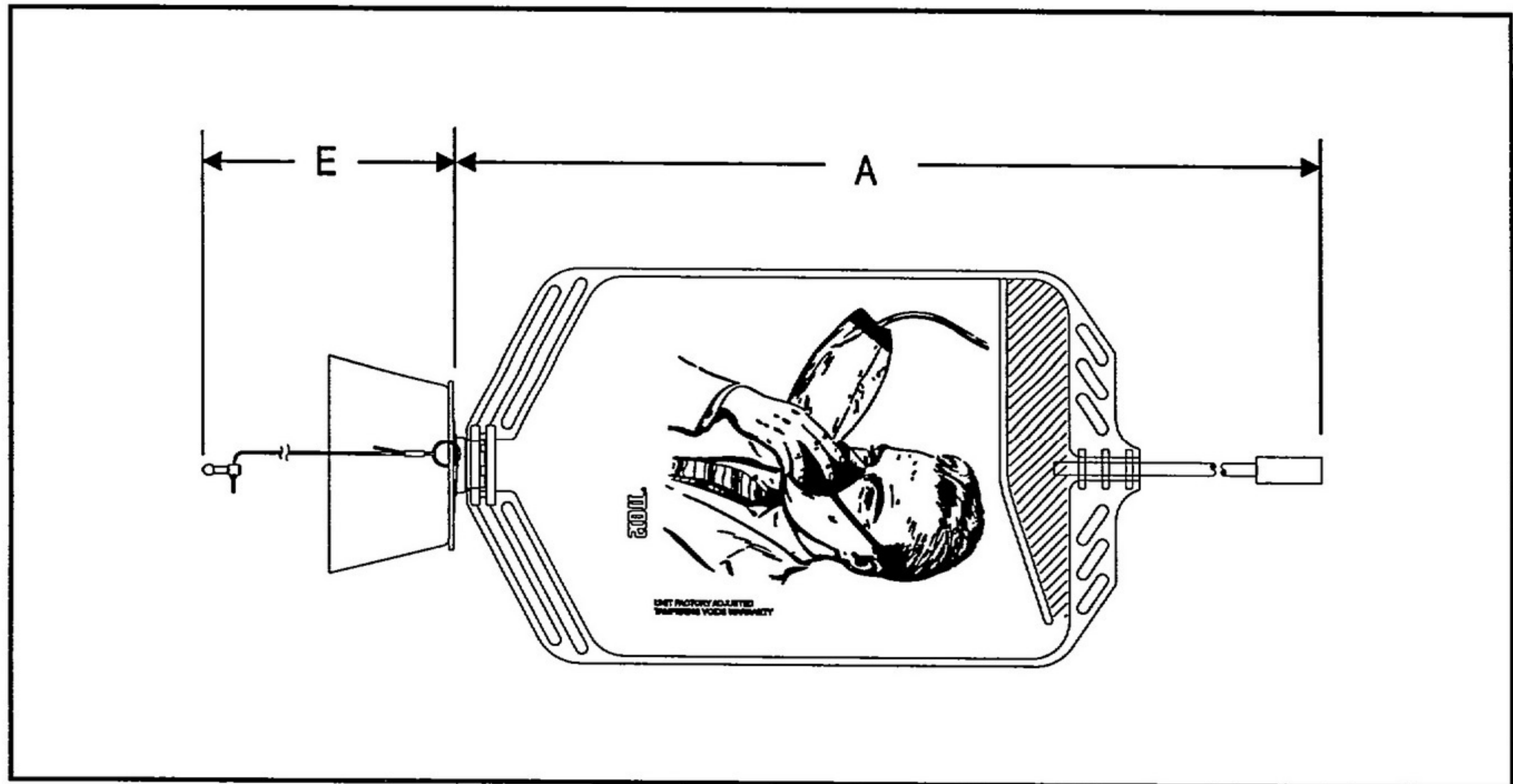


PAX Masks of IPL Figure 2  
Figure 2



Table 2  
Allowable Dimensions for PAX Masks of Figure 2

PAX MASK PART NUMBER	DIMENSION (in / cm)	
	A (±1.00 in. / 2.5 cm)	B (±1.00 in. / 2.5 cm)
289-801-101	47.00 / 119.4	25.00 / 63.5

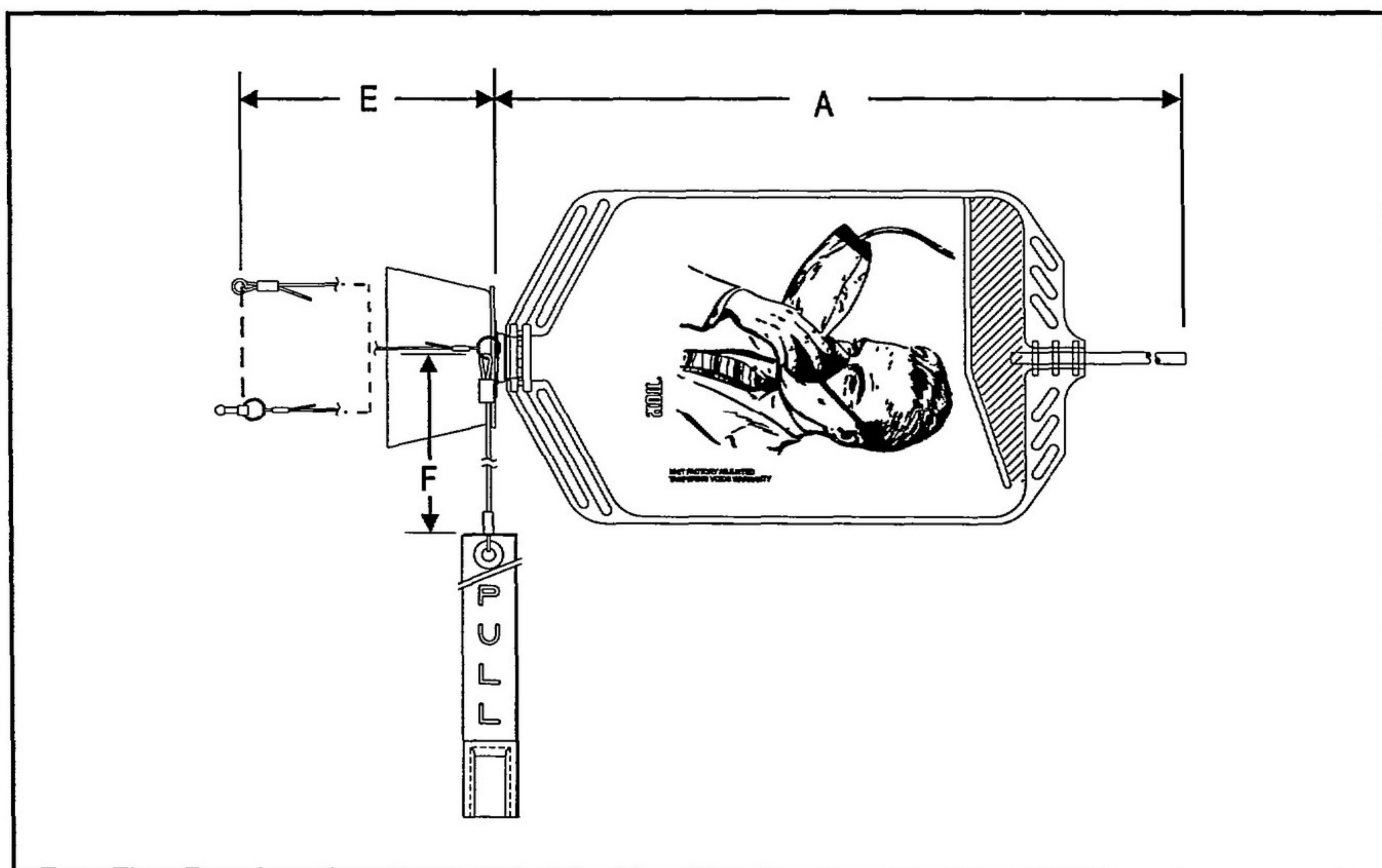


PAX Masks of IPL Figure 3  
Figure 3



**Table 3**  
**Allowable Dimensions for PAX Masks of Figure 3**

PAX MASK PART NUMBER	DIMENSION (in / cm)	
	A (±1.00 in. / 2.5 cm)	E (±1.00 in. / 2.5 cm)
289-801-235	46.00 / 116.8	7.10 / 18.0

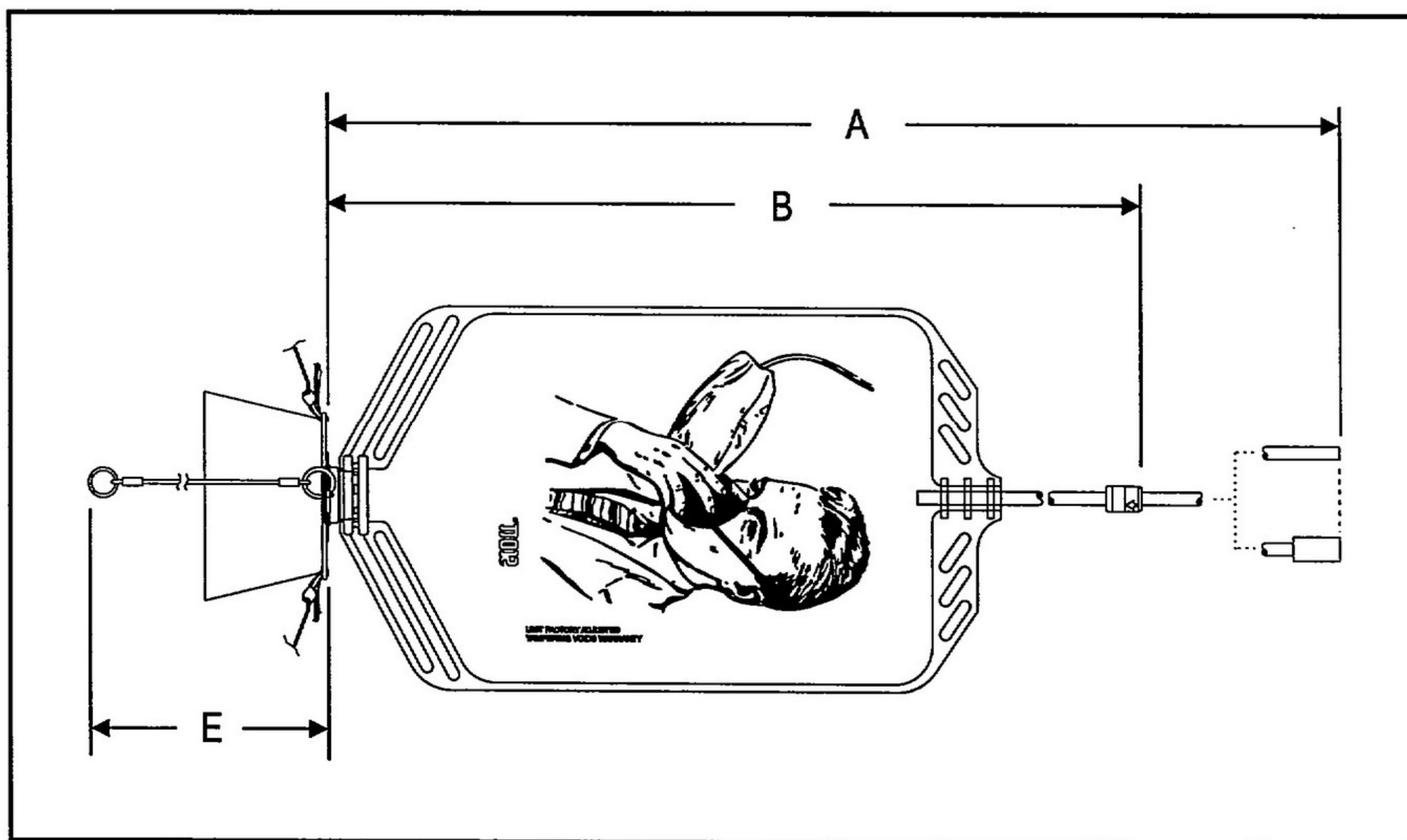


PAX Masks of IPL Figure 4  
Figure 4



**Table 4**  
**Allowable Dimensions for PAX Masks of Figure 4**

PAX MASK PART NUMBER	DIMENSION (in / cm)		
	A (± 3.00 in. / 7.6 cm)	E (± 0.50 in. / 1.3 cm)	F (± 0.50 in. / 1.3 cm)
289-801-724-1A	61.00 / 154.9	11.00 / 27.9	—
289-801-724-2A	61.00 / 154.9	11.00 / 27.9	—
289-801-724-3A	61.00 / 154.9	25.00 / 63.5	—
289-801-724-4A	61.00 / 154.9	25.00 / 63.5	—
289-801-724-5A	76.00 / 193.0	41.00 / 104.1	—
289-801-724-6A	76.00 / 193.0	41.00 / 104.1	—
289-801-724-7A	49.00 / 124.5	20.50 / 52.1	—
289-801-724-8A	49.00 / 124.5	20.50 / 52.1	—
289-801-724-9A	61.00 / 154.9	28.00 / 71.1	—
289-801-724-10A	61.00 / 154.9	28.00 / 71.1	—
289-801-724-11A	49.00 / 124.5	20.50 / 52.1	7.50 / 19.1
289-801-724-12A	49.00 / 124.5	20.50 / 52.1	7.50 / 19.1
289-801-724-13A	85.00 / 215.9	39.00 / 99.1	—
289-801-724-14A	85.00 / 215.9	39.00 / 99.1	—
289-801-724-15A	76.00 / 193.0	28.00 / 71.1	—
289-801-724-16A	76.00 / 193.0	28.00 / 71.1	—
289-801-724-17A	85.00 / 215.9	41.00 / 104.1	—
289-801-724-18A	85.00 / 215.9	41.00 / 104.1	—

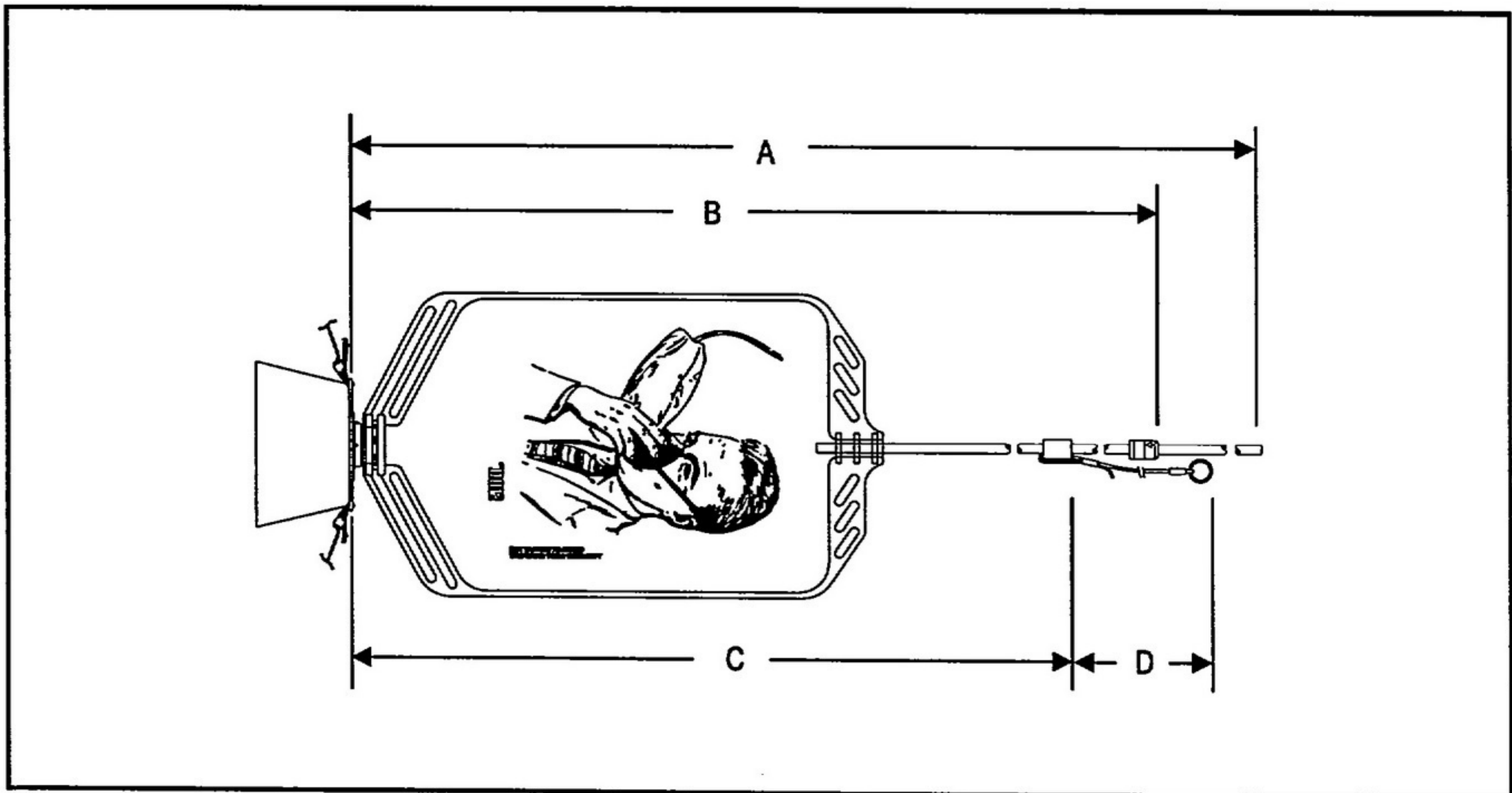


PAX Masks of IPL Figure 5  
Figure 5



**Table 5**  
**Allowable Dimensions for PAX Masks of Figure 5**

PAX MASK PART NUMBER	DIMENSION (in / cm)		
	A (±1.00 in. / 2.5 cm)	B (± 1.00 in. / 2.5 cm)	E (± 0.25 in. / 0.6 cm) (Except As Noted)
289-801-051	55.00 / 139.7	25.00 / 63.5	9.50 / 24.1
289-801-052	55.00 / 139.7	25.00 / 63.5	12.50 / 31.8
289-801-053	60.00 / 152.4	25.00 / 63.5	4.50 / 11.4
289-801-054	66.00 / 167.6	25.00 / 63.5	3.50 / 8.9
289-801-055	66.00 / 167.6	25.00 / 63.5	4.50 / 11.4
289-801-056	66.00 / 167.6	25.00 / 63.5	12.50 / 31.8
289-801-057	71.00 / 180.3	25.00 / 63.5	3.50 / 8.9
289-801-119	46.00 / 116.8	39.25 / 99.7	10.50 / 26.7
289-801-120	60.00 / 152.4	49.25 / 125.1	7.30 / 18.5
289-801-121	70.00 / 177.8	55.00 / 139.7	4.50 / 11.4
289-801-122	70.00 / 177.8	55.00 / 139.7	4.50 / 11.4
289-801-236	46.00 / 116.8	40.00 / 101.6	12.00 / 30.5
289-801-237	60.00 / 152.4	50.00 / 127.0	7.50 / 19.0 (±0.10 / 0.25)
289-801-240	46.00 / 116.8	40.00 / 101.6	10.50 / 26.7

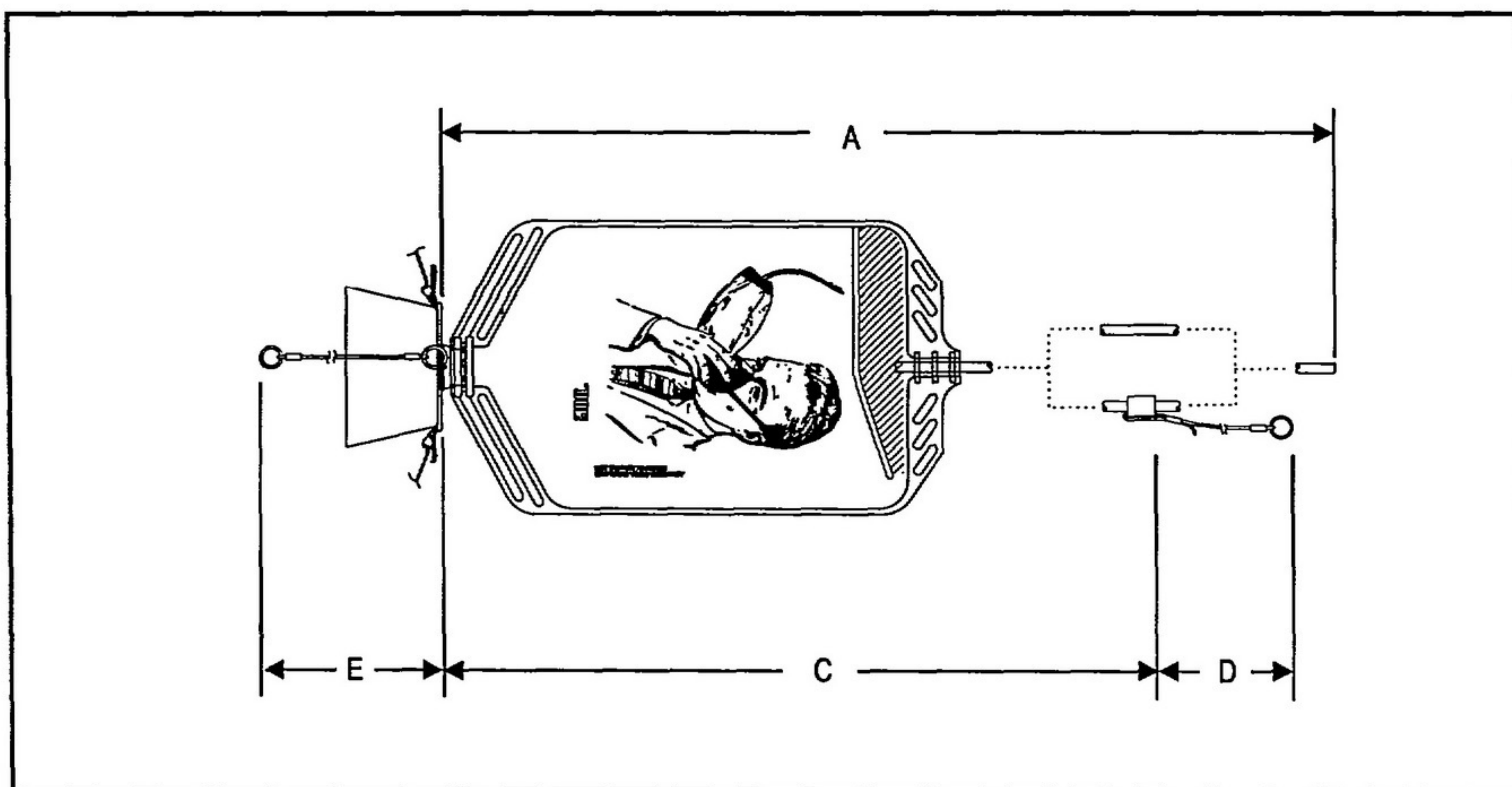


PAX Masks of IPL Figure 6  
Figure 6



Table 6  
Allowable Dimensions for PAX Masks of Figure 6

PAX MASK PART NUMBER	DIMENSION (in / cm)			
	A (±1.00 in. / 2.5 cm)	B (± 1.00 in. / 2.5 cm)	C (± 0.25 in. / 0.6cm)	D (± 0.25 in. / 0.6 cm) (Except As Noted)
289-801-058	66.00 / 167.6	25.00 / 63.5	16.50 / 41.9	10.50 / 26.7
289-801-059	66.00 / 167.6	25.00 / 63.5	16.50 / 41.9	12.50 / 31.8
289-801-238	66.00 / 167.6	55.00 / 139.7	16.00 / 40.6	9.50 / 24.1
289-801-239	63.00 / 160.0	52.00 / 132.1	12.50 / 31.8	7.50 / 19.1 (±0.10 / 0.25)
289-801-241	63.00 / 160.0	57.00 / 144.8	12.50 / 31.8	10.30 / 26.2 (±0.10 / 0.25)



PAX Masks of IPL Figure 7  
Figure 7



Table 7  
Allowable Dimensions for PAX Masks of Figure 7

PAX MASK PART NUMBER	DIMENSION (in / cm)			
	A (±1.00 in. / 2.5 cm)	C (± 0.25 in. / 0.6 cm)	D (± 0.25 in. / 0.6 cm)	E (±0.25 in. / 0.6 cm)
289-801-060	66.00 / 167.6	—	—	3.50 / 8.9
289-801-061	66.00 / 167.6	—	—	12.50 / 31.8
289-801-062	71.00 / 180.3	—	—	3.50 / 8.9
289-801-063	78.00 / 198.1	16.50 / 41.9	12.50 / 31.8	—



**WARNING: THE PAX MASK MIXES AMBIENT AIR AND SUPPLEMENTAL OXYGEN AND WILL NOT PROTECT THE USER FROM POISONOUS AGENTS IN THE AMBIENT AIR THAT CAN CAUSE ILLNESS, INJURY OR DEATH.**

### 3. Purpose of Equipment

The purpose of the PAX Mask is to mix oxygen with air (e.g., aircraft cabin air) in a facepiece assembly, when supplemental oxygen is required during an emergency situation

### 4. Installation

Pax Masks are typically installed in passenger service units, attendant stations and lavatories in the aircraft and connected to a constant source of oxygen (e.g., a replaceable chemical oxygen generator or a rechargeable source of pressurized gaseous oxygen). The rate and duration of oxygen flow from the source may depend on time, pressure or cabin altitude.

During installation, the PAX Masks are stowed in the correct position (as given by the specific application) so they deploy safely and begin to operate when required.

### 5. Description and Operation

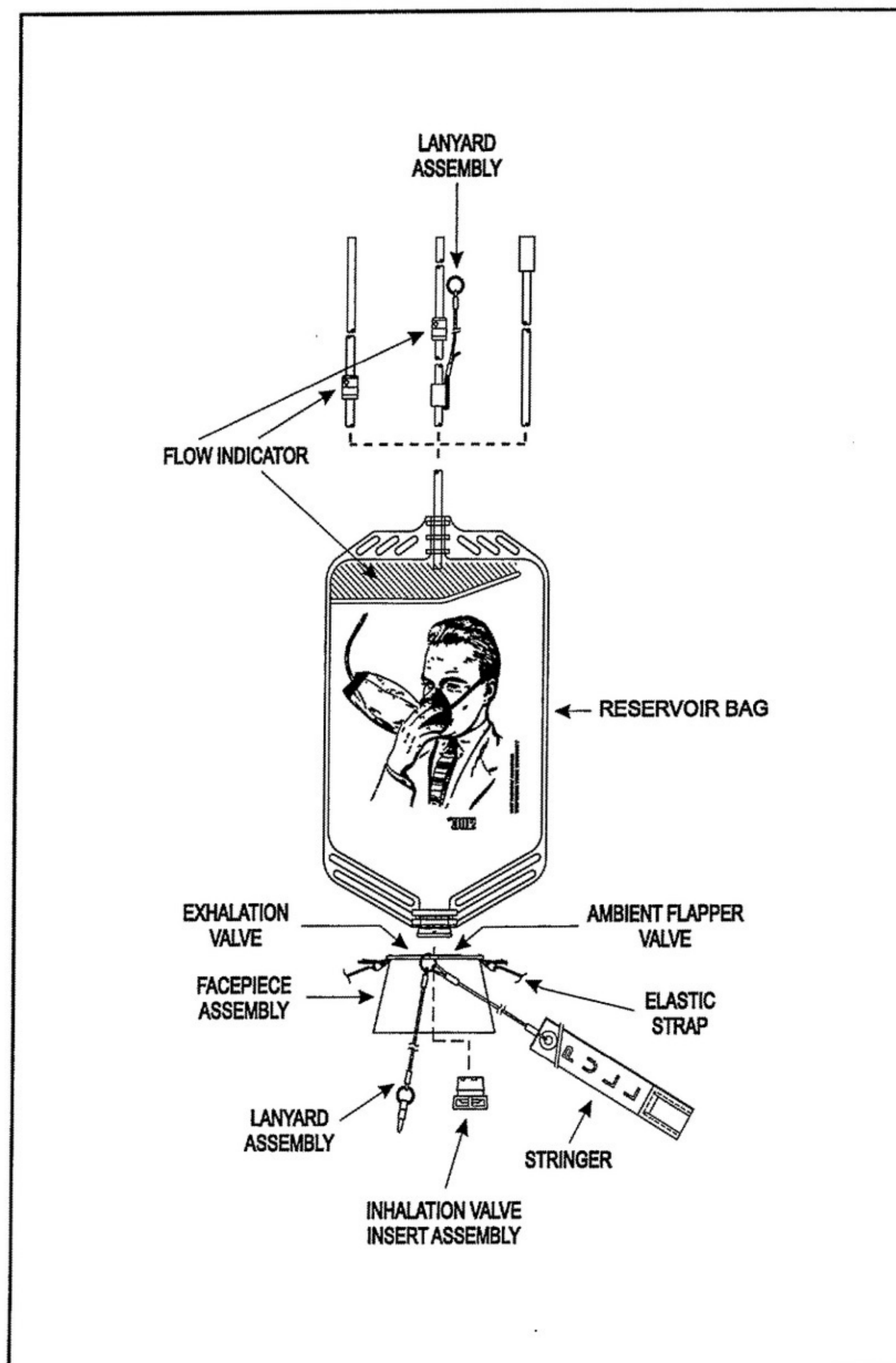
Refer to Figure 8 for Parts and Assemblies of the PAX Mask. All PAX Masks will have a facepiece assembly, an elastic strap, an inhalation valve insert assembly with a flapper, a bag assembly and a flow indicator. Some PAX Masks will also have a lanyard assembly. Other PAX Masks will have a lanyard assembly and a stringer assembly.

The PAX Mask has two modes of operation - stowed and deployed. In the stowed mode, the mask is packed into a box located near the passenger. Since the mask is intended for use in emergencies only, it may remain stowed throughout its service life. When cabin pressure falls below a preset threshold value and supplemental oxygen is required, the PAX Mask automatically deploys in front of the passenger or attendant and the facepiece assembly is put over the mouth and nose while the elastic strap is put around the back of the head to hold the Mask in place. When some masks deploy, a lanyard assembly (attached to either the tubing of the bag assembly or the facepiece assembly) must be pulled downward to start the flow of oxygen to the PAX Mask. On other configurations, a stringer with the word "PULL" printed on it must be pulled to release the mask and to start the flow of oxygen.

During operation, oxygen flows through the tubing and into the reservoir bag. Oxygen flow is indicated by the flow indicator in the tubing or the flow indicator in the reservoir bag depending on model. During inhalation, oxygen is drawn from the reservoir bag through the inhalation valve. When the oxygen in the bag is depleted, the ambient flapper valve opens to allow ambient air (i. e. cabin air) to enter the facepiece. When the user exhales, the inhalation and ambient air valves close and the exhalation valve opens allowing exhaled air to exit the facepiece. The reservoir bag stores oxygen for the next cycle while the user is exhaling.

Each PAX Mask has a bag assembly with indicator and lanyard, a facepiece assembly and an inhalation valve insert assembly. Refer to Figure 8 for an illustration of the Parts and Assemblies of the PAX Mask which have the following functions:





Parts and Assemblies of the PAX Mask  
Figure 8

**35-22-07**



## 5. Description and Operation (Continued)

### A. Bag Assembly, Indicator & Lanyard

The bag assembly consists of a reservoir bag, a flow indicator and tubing. There may also be a lanyard assembly or a lanyard assembly and a stringer. The following paragraphs describe the parts of bag assembly.

#### (1) Reservoir Bag

The reservoir bag accumulates oxygen during exhalation to supply oxygen for the next inhalation.

The Scott part number of the PAX Mask, the manufacture date and sometimes the customer's part number are printed on one side of the reservoir bag. The nomenclature, the TSO number and sometimes other technical standards are printed on the other side of the bag. A picture of a person wearing the mask assembly is printed on both sides of the bag.

#### (2) Tubing

The tubing connects the constant source of oxygen to the reservoir bag. In addition, the tubing may have a flow indicator attached to it.

#### (3) Flow Indicator

The flow indicator gives a visual indication when there is a flow of oxygen into the reservoir bag. There are two different types of flow indicators, but only one type is used for each PAX Mask. The different types of flow indicators are described as follows:

- (a) One type of flow indicator is attached to the tubing of the bag assembly. This flow indicator shows a green stripe at the clear end of the plastic housing when there is a flow of oxygen. When there is no flow of oxygen, the green stripe is hidden behind the label of the flow indicator.
- (b) The other type of flow indicator is a part of the reservoir bag that is colored green. When there is a flow of oxygen into the reservoir bag, the green section of the reservoir bag inflates. When there is no flow of oxygen, the green section of the reservoir bag remains flat.

#### (4) Lanyard Assembly

When present, one end of the lanyard assembly attaches to either the facepiece or the tubing. The other end of the lanyard assembly attaches to a control device for starting the flow of oxygen. The flow of oxygen to the PAX Mask starts when the lanyard is pulled with sufficient force. The lanyard assembly attaches to the tubing at a specific location as shown in Leading Particulars in this section.

#### (5) Stringer

On some configurations, a stringer is attached to the lanyard ring at the facepiece. Pulling the stringer with sufficient force deploys the mask and starts the flow of oxygen.



## 5. Description and Operation (Continued)

### B. Facepiece Assembly

The facepiece assembly is a breathing device that delivers oxygen and cabin air to a passenger. It is made of a soft material and is sealed tightly in place over the nose and mouth by an adjustable elastic strap that fits around the head.

The facepiece assembly has an ambient flapper valve and an exhalation valve. The ambient flapper valve opens during inhalation allowing external air (e.g. cabin air) into the facepiece after the oxygen in the reservoir bag has been used up. The ambient flapper valve closes when the user breathes out. The exhalation valve closes when the user breathes in and opens when the user breathes out allowing exhaled air out of the facepiece assembly.

When a lanyard assembly is present, it is attached to a hole in the facepiece assembly by a wire ring. The other end is attached to a control device for starting the flow of oxygen. The lanyard starts the flow of oxygen when pulled with sufficient force after the PAX Mask is deployed. If a stringer is present, it is attached to the lanyard ring at the facepiece. The stringer must be pulled to deploy the mask and to start the flow of oxygen. The lanyard assembly and the stringer have specific lengths as shown in Leading Particulars in this section of this manual.

The facepiece is not a serviceable assembly, however, the elastic strap, stringer, lanyard, and/or ring that attaches to the facepiece may be replaced with new ones if they are damaged or missing.

### C. Inhalation Valve Insert Assembly

The inhalation valve allows the oxygen from the reservoir bag of the bag assembly into the facepiece assembly when the user breathes in. It also holds the facepiece assembly and the bag assembly together. This valve opens when the user breathes in and closes when the user breathes out.



## TESTING AND FAULT ISOLATION

### 1. General

This section contains the testing and fault isolation procedures for the 289-801 series Passenger Oxygen Mask Assemblies (PAX Masks). If any repair or service is performed on the PAX Mask or any of its components, the PAX Mask must pass the tests in this section after all repairs or service are completed. Should a failure occur during the testing procedures, refer to Table 103, Troubleshooting Chart, for help. Refer to the ILLUSTRATED PARTS LIST section of this manual for the item numbers given in parentheses.

**NOTE:** Unless otherwise noted, any use of an item number in this section includes all alpha variants and dashed variants (i.e., items not shown) of that number. For example, item (90) includes 90, -90, 90A thru 90L.

### 2. Test Materials

Consumable test materials required for this section of the manual are listed in Table 101. Equivalent materials may be used for the listed items.

**Table 101  
Consumable Test Materials**

MATERIAL	DESCRIPTION	MANUFACTURER
Test Gas	Oxygen (MIL-O-27210, Type I) (refer to Note 1)	Local Vendor
<p>Note 1: Oxygen (MIL-O-27210, Type I) is the test gas specified in the test procedures in this section of the manual. If water pumped nitrogen or water pumped air (specified in Note 2) is used for the test gas, the applicable test parameters must have the appropriate density correction factors calculated and used, and the test equipment must be calibrated for the test gas. (A copy of specification MIL-O-27210 is available from: Standardization Documents Order Desk, Building 4D, 700 Robbins Avenue, Philadelphia, PA 19111-5094 USA)</p> <p>Note 2: Water pumped nitrogen per Federal Specification BB-N-411, Type I, Class I, Grade B. (A copy of Federal Specification BB-N-411C is available from: General Services Administration, Business Service Center, Washington, DC USA)</p> <p>Water pumped air, equivalent in purity to: MIL-O-27210, Type I</p>		



### 3. Special Tools and/or Test Equipment

Special tools or test equipment required for this section of the manual are listed in Table 102. Equivalent test equipment may be used for the listed items

**Table 102**  
**Special Tools and Test Equipment**

QTY	PART NAME	NUMBER	MANUFACTURER
1	Flow Control Valve (1/2 inch NPT fittings)	Model Number B18VF8	Whitey Co. Highland Heights, OH 44143-1533 USA (V12623)
1	Flowmeter (9.1 to 91 slpm)	Model Number 1110CJ32CBGAA	Emerson Electric Co. Brooks Instrument Div. Hatfield, PA 19440-3052 USA (V91556)
1	Flowmeter (0.1 to 1.1 slpm)	Model Number 1110CC01BBGAA	
1	Force Gauge 0 to 30 pound force (0 to 133 N)	Model Number DPP 30 or DPP200N DPP 30 = 30 pound force max. DPP 200N = 200 newtons max.	John Chatillon & Sons, Inc. Greensboro, NC 27409-9696 USA (V1CN79)
1	Manometer 0 to 3.0 in H <sub>2</sub> O (0 to 750 Pa)	Model Number 2003 (Magnehelic* Gauge)	Dwyer Instrument Inc. Michigan City, IN 46360-0373 USA (V85274)
1	Pinch Clamp	-----	Commercially Available
1	Mask Fixture	P/N 405-332	Scott Aviation Lancaster, NY 14086-9502 USA (53655)
1	Pressure Gauge 0 to 15 psig (0 to 103 kPa)	Model 508 Series	Ametek, Inc.; U.S. Gauge Div. Sellersville, PA 18960-2625 USA (V61349)
1	Pressure Gauge 0 to 160 psig (0 to 1103 kPa)	Model 1408 Series	
1	Regulator, Air Pressure 0 to 25 psig (0 to 172 kPa)	P/N 100321	Vemco Corp. San Dimas, CA 91773-2925 USA (V62527)
1	Regulator, Test Gas 0 to 10 psig (0 to 69 kPa)	P/N 100320	
* Magnehelic® is a registered tradename of Dwyer Instrument Inc., Michigan City, IN, USA.			



#### 4. Test Procedure

**WARNING:** ALL PROCEDURES DESCRIBED IN THIS MANUAL SHALL BE PERFORMED IN AN AREA FREE OF DUST, LINT, FINE METAL FILINGS, OIL, GREASE, FLAMMABLE SOLVENTS OR OTHER COMBUSTIBLE MATERIALS. THESE MATERIALS MAY CONTAMINATE THE PAX MASK AND CAUSE A MALFUNCTION RESULTING IN SERIOUS PERSONAL INJURY OR DEATH.

**WARNING:** IN ALL PROCEDURES LISTED BELOW, OXYGEN IS USED AS THE TEST GAS. WATER PUMPED NITROGEN OR WATER PUMPED AIR MAY BE SUBSTITUTED, BUT TEST RESULTS MUST BE CONVERTED PRIOR TO BEING COMPARED WITH TEST RESULTS SPECIFIED FOR OXYGEN. DO NOT, UNDER ANY CIRCUMSTANCES, USE OIL-PUMPED GAS AS THIS WILL CAUSE CONTAMINATION OF THE VALVE AND TEST EQUIPMENT. OIL, EVEN IN MINUTE QUANTITY, COMING IN CONTACT WITH OXYGEN MAY CAUSE AN EXPLOSION OR FIRE.

**WARNING:** SUITABLE EYE PROTECTION SHALL BE WORN TO PREVENT ACCIDENTAL EYE INJURIES.

When using the manometer for any of the following tests, visually make sure that the meter on the manometer is set to 0 in H<sub>2</sub>O (0 Pa) before the test. If necessary, adjust the manometer to 0 in H<sub>2</sub>O (0 Pa) before the test.

All flow rates in this section are given in liters per minute (lpm) at Normal Temperature and Pressure Dry (NTPD). The flowmeter must be calibrated at NTPD (70 °F (21°C), 760 mm Hg, Dry) before measuring flow rates in this section.

**NOTE:** Make sure that the connections to the test equipment are tight or incorrect test results will occur.

The following tests apply to all PAX Masks unless a different direction is given. Perform the following tests on the PAX Masks in the order given:

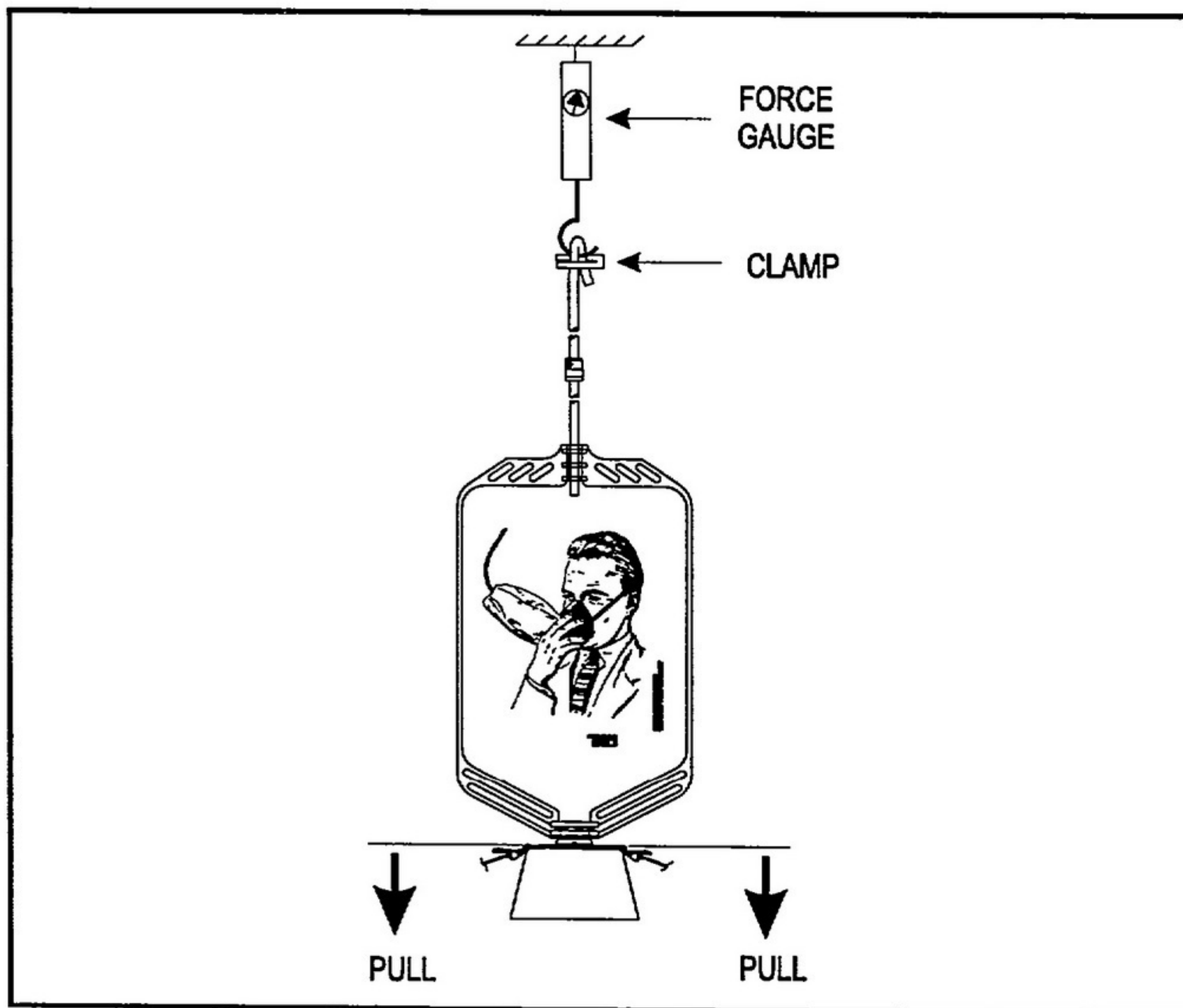
##### A. Pull Test

- (1) Connect the PAX Mask to the test equipment as shown in Figure 101. Attach the end of the tubing of the bag assembly to the force gauge. If there is a flow indicator (60) installed in the tubing, it must be part of this test.

**CAUTION:** FAILURE TO USE THE RIGID PART OF THE FACEPIECE ASSEMBLY (10) FOR THE APPLICATION OF FORCE DURING THE STRENGTH TEST MAY CAUSE DAMAGE TO THE FACEPIECE ASSEMBLY.

- (2) Pull downward (away from the force gauge) on the facepiece assembly (10) until the force gauge shows a force of 20 lbs (89 N) and hold for a minimum of three seconds. If the tubing is long, a second person may be required to read the gauge.
- (3) Remove the PAX Mask from the test equipment and visually check the PAX Mask for any apparent damage (e.g., holes in the PAX Mask or separation of the bag assembly) that this test may have caused. Damage to any part of the PAX Mask is a failure of this test.





Test Setup for Pull Test  
Figure 101

4. Test Procedure (Continued)

## B. Input Flow Test

**WARNING: KEEP HANDS CLEAR OF FIXTURE WHEN CLOSING OR INJURY MAY OCCUR.**

- (1) Connect the test equipment as shown in Figure 102. Attach the facepiece assembly (10) to the mask fixture as follows:
  - (a) Apply approximately 15 to 20 psig (103 to 138 kPa) of air pressure to the fitting (open) of the mask fixture so that the piston moves away from the top of the mask fixture.
  - (b) Refer to Figure 103 and put the large diameter of the yellow facepiece around the top edge of the piston, inside the top edge of the mask fixture.

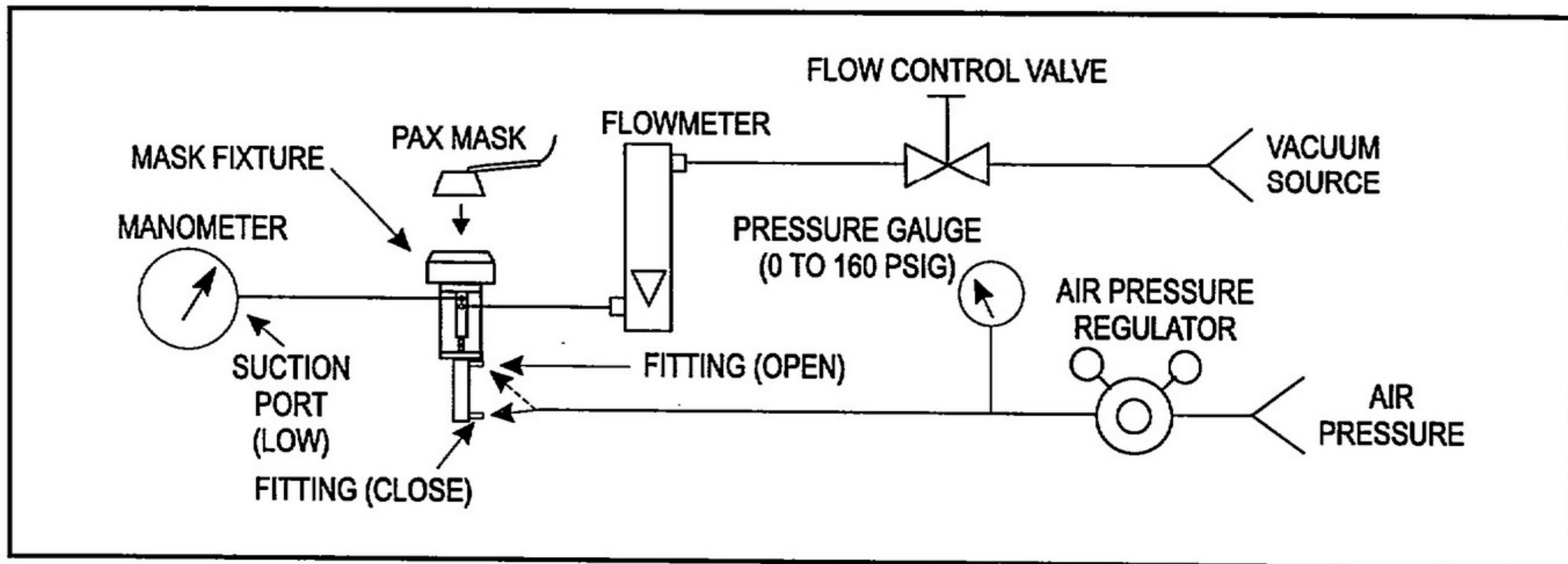
**NOTE:** Be careful to keep all other objects (e.g., the elastic band) out of the fixture. Another object in the fixture may cause incorrect test results.

- (c) Apply approximately 15 to 20 psig (103 to 138 kPa) of air pressure continuously to the fitting (close) of the mask fixture so that the complete edge of the yellow facepiece seals between the mask fixture and the piston.

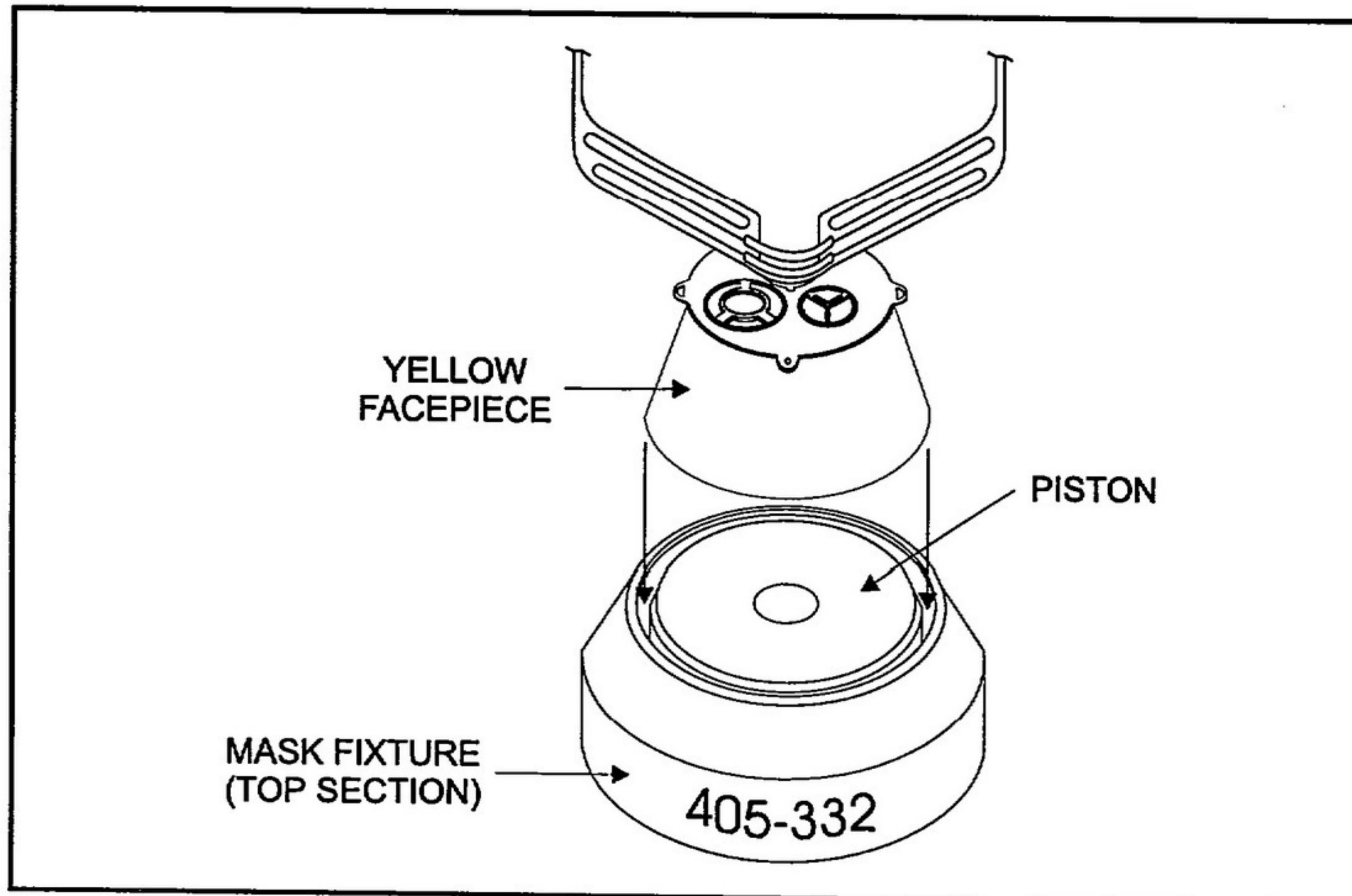
**NOTE:** It is important that the large diameter of the facepiece (that is attached to the fixture) be below the inhalation and ambient valves, or gravitational forces on the flapper and spring of the ambient flapper valve may cause incorrect test results.

- (2) Seal the tubing end of the PAX Mask (e.g., plug or finger over the opening at the end of the tubing) so that ambient air is not allowed into the bag assembly for this test.
- (3) Start operation of the vacuum source and carefully adjust the flow control valve until the flowmeter shows 30 lpm. With a flow rate of 30 lpm, the manometer reading must be between 0 and 0.8 in H<sub>2</sub>O (0 to 199 Pa).
- (4) Carefully adjust the flow control valve until the flowmeter shows 70 lpm. With a flow rate of 70 lpm, the manometer reading must be between 0 and 2.0 in H<sub>2</sub>O (0 to 498 Pa).
- (5) Close the flow control valve and decrease the pressure of the air pressure regulator to 0 psig (0 Pa). Apply approximately 15 to 20 psig (103 to 138 kPa) of air pressure to the fitting (open) of the mask fixture so that the piston moves away from the top of the mask fixture. Remove the PAX Mask from the mask fixture.





Test Setup for Input Flow Test  
Figure 102



Attachment of Facepiece to Fixture  
Figure 103



#### 4. Test Procedure (Continued)

##### C. Output Flow Test

- (1) Connect the test equipment as shown in Figure 104. Attach the facepiece assembly to the mask fixture as follows:
  - (a) Apply approximately 15 to 20 psig (103 to 138 kPa) of air pressure to the fitting (open) of the mask fixture so that the piston moves away from the top of the mask fixture.
  - (b) Refer to Figure 103 and put the large diameter of the yellow facepiece around the top edge of the piston, inside the top edge of the mask fixture.

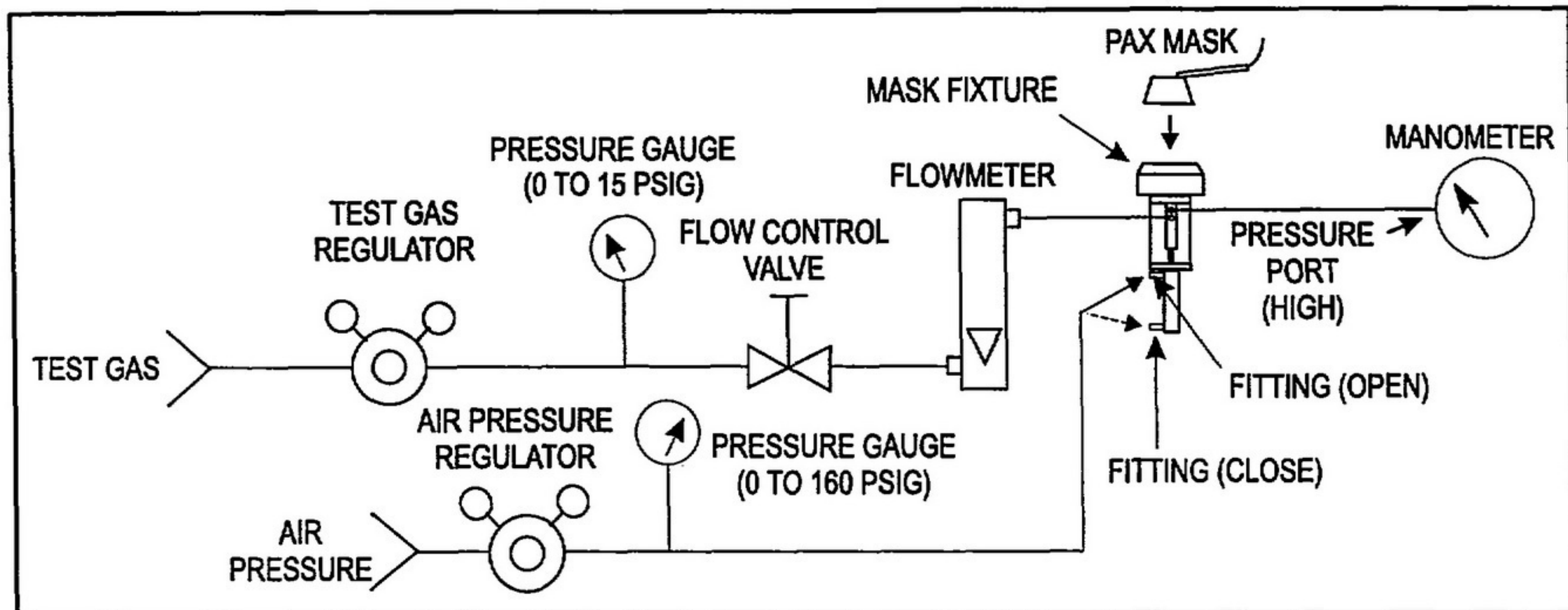
**NOTE:** Be careful to keep all other objects (e.g., the elastic band) out of the fixture. Another object in the fixture may cause incorrect test results.

- (c) Apply approximately 15 to 20 psig (103 to 138 kPa) of air pressure continuously to the fitting (close) of the mask fixture so that the complete edge of the yellow facepiece seals between the mask fixture and the piston.

**CAUTION: DO NOT ADJUST THE TEST GAS REGULATOR ABOVE 10 PSIG OR THE MASK ASSEMBLY MAY BE DAMAGED.**

- (2) Carefully adjust the test gas regulator until the pressure gauge reading is 5.0 psig (34 kPa).
- (3) Carefully adjust the flow control valve until the flowmeter reading is 30 lpm. If the flow rate does not increase to 30 lpm, carefully increase the output pressure of the test gas regulator until the flow rate is 30 lpm but do not allow the pressure gauge to exceed 10 psig.
- (4) With a flow rate of 30 lpm, the manometer reading must be between 0 and 0.8 in H<sub>2</sub>O (0 to 199 Pa).
- (5) Carefully adjust the flow control valve until the flowmeter reading is 70 lpm. If the flow rate does not increase to 70 lpm, carefully increase the output pressure of the test gas regulator until the flow rate is 70 lpm, but do not allow the pressure gauge to exceed 10 psig. With a flow rate of 70 lpm, the manometer reading must be between 0 and 2.0 in H<sub>2</sub>O (0 to 498 Pa).
- (6) Decrease the pressure of the test gas regulator and the air pressure regulator to 0 psig (0 Pa). Apply approximately 15 to 20 psig (103 to 138 kPa) of air pressure to the fitting (open) of the mask fixture so that the piston moves away from the top of the mask fixture. Remove the PAX Mask from the mask fixture.





Test Setup for Output Flow Test  
Figure 104

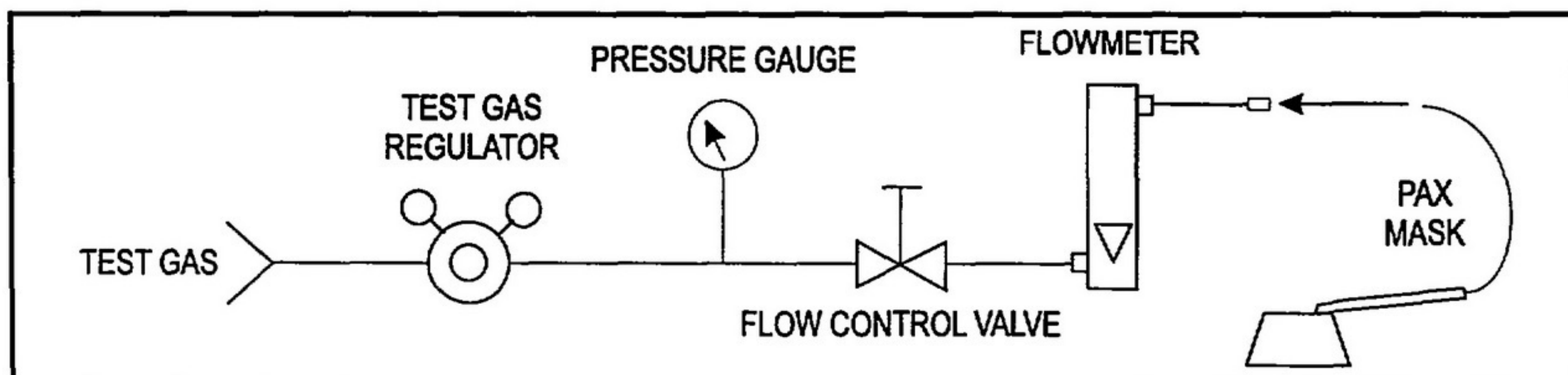
#### 4. Test Procedure (Continued)

##### D. Flow Indicator Test

(1) Connect the test equipment as shown in Figure 105.

**NOTE:** Make sure the connections to the test equipment are tight or incorrect test results will occur.

- (2) Close the flow control valve. Carefully adjust the test gas regulator until the pressure gauge shows 5 psig (34 kPa). Adjust the flow control valve until the flowmeter shows 0.5 lpm.
- (3) While the test gas is flowing, connect the tubing of the bag assembly (50) to the output of the flowmeter. The flow indicator (60) that is in the tubing must show a green stripe or the green flow indicator portion of the bag assembly (10) must inflate to pass this test.
- (4) Disconnect the tubing of the bag assembly (10) from the flowmeter. The flow indicator (60) in the tubing must no longer show a green stripe or if the green flow indicator portion of the bag is deflated by hand, it must not inflate again.
- (5) Repeat steps 3 and 4 to make sure the indicator is operating correctly.



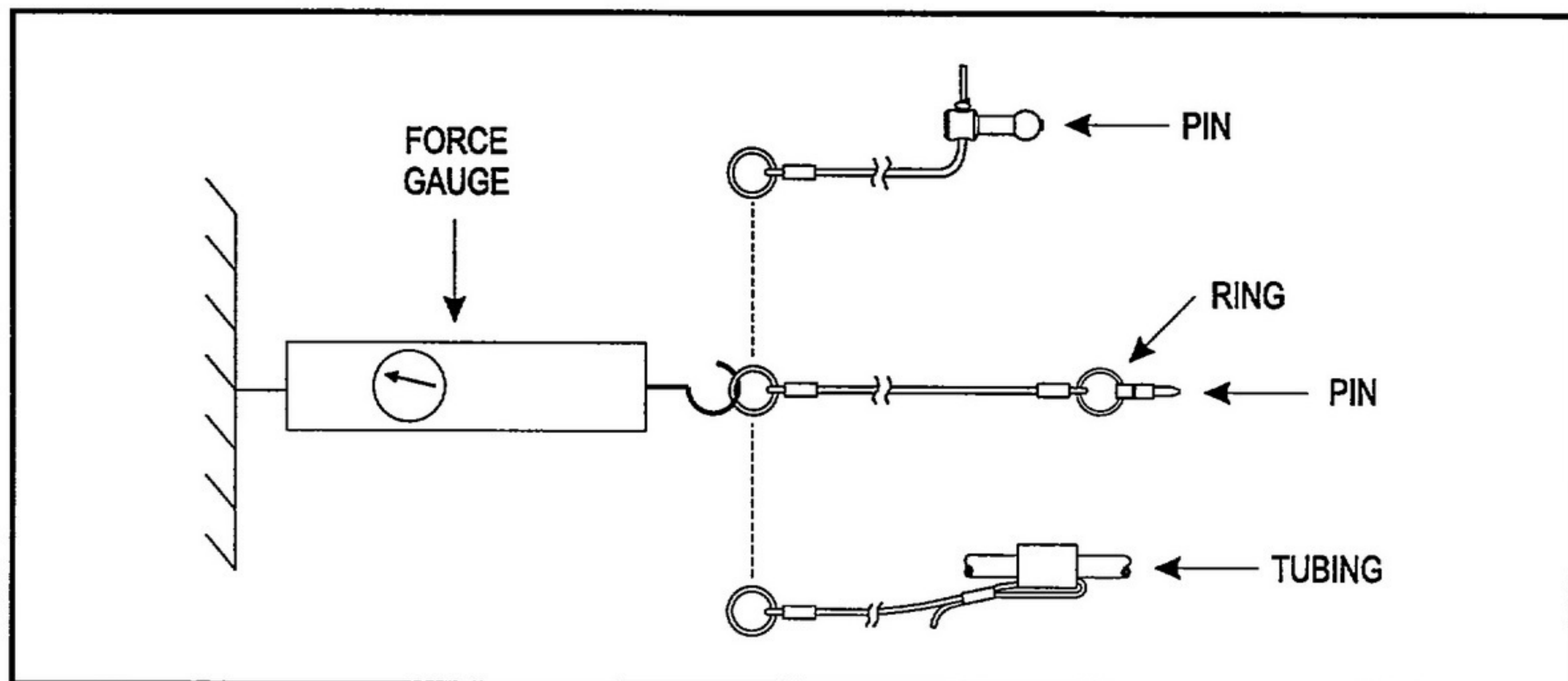
Test Setup for Flow Indicator Test  
Figure 105



#### 4. Test Procedure (Continued)

##### E. Lanyard Strength Test

- (1) Perform one of the following as applicable.
  - (a) Connect the ring (100) of the lanyard assembly (90) to the test equipment as shown in Figure 106.
  - (b) Connect the ring (100) of the lanyard assembly (90) to the test equipment as shown in Figure 106.
  - (c) Connect the ring (80) on lanyard (70) attached to the tubing of the bag assembly (50) to the test equipment as shown in Figure 106.
- (2) Slowly pull the ring (100), the pin (110) or the tubing of the bag assembly (50), as applicable, until the force gauge shows a force of 10 lbs (44N).
- (3) Disconnect the lanyard assembly from the equipment and visually check for damage to the cord, movement of the splices, distortion of the ring or damage to the tubing. Any such damage is a failure of the test.



Test Setup for Lanyard Strength Test  
Figure 106



## 5. Troubleshooting

Refer to Table 103, Troubleshooting Chart, for troubleshooting problems, probable causes and solutions for the PAX Masks.

**Table 103**  
**Troubleshooting Chart**

PROBLEM	PROBABLE CAUSE	SOLUTION
Paragraph 4.A. Pull Test		
Bag assembly (50) separated from facepiece assembly (10).	Inhalation valve insert assembly (30) loose.	Re-install inhalation valve insert.
	Bag assembly (50) has hole.	Replace bag assembly.
Bag assembly (50) has a hole.	Defective bag assembly.	Replace bag assembly.
Flow indicator (60) separated from tubing.	Tubing loose on flow indicator.	Re-install tubing fully onto flow indicator.
Tubing on bag assembly (50) has a hole.	Defective tubing.	Replace bag assembly.
Paragraph 4.B. Input Flow Test		
Manometer vacuum is not in permitted range.	Ambient flapper valve inside the facepiece assembly (10) is stuck.	Defective flapper valve, replace facepiece assembly (10).
	Ambient flapper valve inside the facepiece assembly (10) has contamination.	Clean facepiece assembly (10).
	Unwanted object between Ambient flapper valve and facepiece assembly (10).	Remove unwanted object.
Flow rate will not increase to the required flow rate (e.g., 30 or 70 lpm).	Malfunction in the ambient flapper valve.	Replace facepiece assembly (10).



**Table 103 (Continued)  
Troubleshooting Chart**

PROBLEM	PROBABLE CAUSE	SOLUTION
Paragraph 4.C. Output Flow Test		
Manometer pressure is not in permitted range.	<p>Exhalation flapper valve inside the facepiece assembly (10) is stuck.</p> <p>Exhalation flapper valve inside the facepiece assembly (10) has contamination.</p> <p>Unwanted object between exhalation flapper valve and facepiece assembly (10).</p>	<p>Defective flapper valve, replace facepiece assembly (10).</p> <p>Clean facepiece assembly (10).</p> <p>Remove unwanted object.</p>
Paragraph 4.D. Flow Indicator Test		
Flow indicator (60) does not show green stripe (for flow indicators in tubing only).	<p>Kink or blockage in tubing of bag assembly (50).</p> <p>Contamination or blockage inside flow indicator.</p> <p>Flow indicator in backwards.</p> <p>Defective flow indicator.</p>	<p>Remove kink or blockage from tubing. If the kink or blockage cannot be removed, replace the bag assembly.</p> <p>Replace flow indicator.</p> <p>Reverse the direction of the flow indicator.</p> <p>Replace defective flow indicator.</p>
Flow indicator (part of reservoir bag) does not operate.	<p>Hole in bag assembly (50).</p> <p>Kink or blockage in tubing of bag assembly (50).</p>	<p>Replace bag assembly.</p> <p>Remove kink or blockage from tubing. If it can not be removed, replace the bag assembly</p>

**Table 103 (Continued)  
Troubleshooting Chart**

PROBLEM	PROBABLE CAUSE	SOLUTION
Paragraph 4.E. Lanyard Strength Test		
Ring (80, 100) is bent.	Defective ring.	Replace ring.
Lanyard assembly (90) has damaged or broken cord.	Defective lanyard assembly.	Replace lanyard assembly.
Lanyard (70) attached to bag assembly (50) is damaged or broken.	Defective lanyard.	Replace bag assembly.
Tubing of bag assembly (50) is damaged.	Defective tubing.	Replace bag assembly.



## DISASSEMBLY

### 1. General

This section describes the equipment and procedures necessary for disassembly of the 289-801 Series Passenger Oxygen Mask Assemblies (PAX Masks). Disassemble the PAX Masks only to the level necessary, as determined in TESTING AND FAULT ISOLATION, to replace the components that may be defective. Refer to the ILLUSTRATED PARTS LIST section of this manual for the item numbers given in parentheses.

**NOTE:** Unless otherwise noted, any use of an item number in this section includes all alpha variants and dashed variants (i.e., items not shown) of that number. For example, item (90) includes 90, -90, 90A thru 90L.

### 2. Special Tools and Equipment

There are no special tools or equipment necessary for disassembly of the PAX Masks.

### 3. Disassembly

The following disassembly instructions apply to all PAX Masks unless otherwise noted.

**WARNING: ALL PROCEDURES DESCRIBED IN THIS MANUAL SHALL BE PERFORMED IN AN AREA FREE OF DUST, LINT, FINE METAL FILINGS, OIL, GREASE, FLAMMABLE SOLVENTS OR OTHER COMBUSTIBLE MATERIALS. THESE MATERIALS MAY CONTAMINATE THE PAX MASK AND CAUSE A MALFUNCTION RESULTING IN SERIOUS PERSONAL INJURY OR DEATH.**

**WARNING: SUITABLE EYE PROTECTION SHALL BE WORN TO PREVENT ACCIDENTAL EYE INJURIES.**

#### A. Pax Masks

Disassemble the parts of the PAX Mask only to the extent described. If a further level of disassembly is necessary for replacement of a damaged, worn or defective part after all the following steps are performed, replacement of the complete assembly that has the damaged, worn or defective part is recommended.

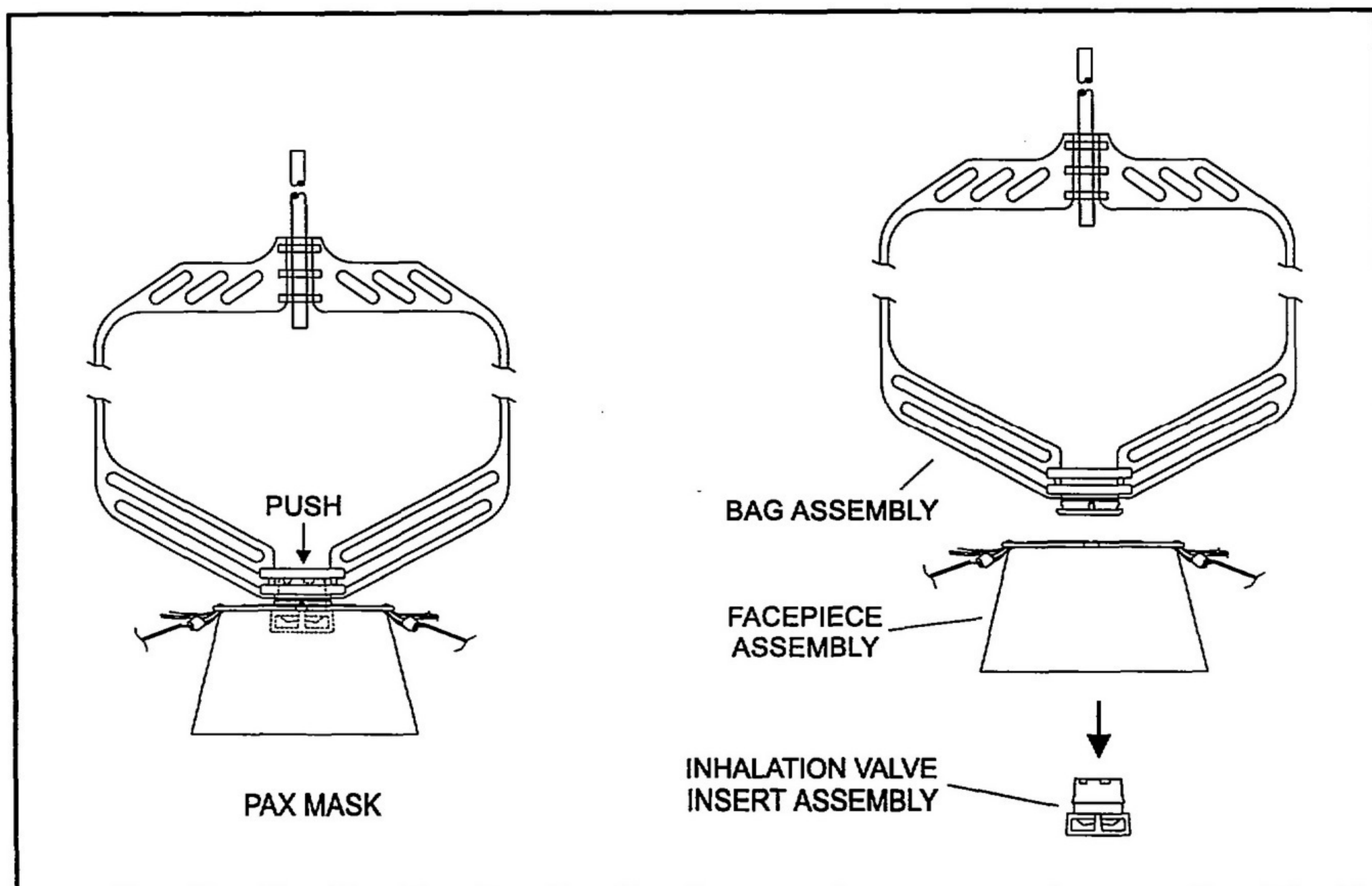
Perform the following disassembly steps:

- (1) Hold the hard plastic top of the facepiece assembly (10) with your fingers so that the inside of the facepiece is facing away. Through the plastic of the bag assembly, push the inhalation valve insert assembly (30) out of the facepiece assembly using your thumbs. Refer to Figure 301 for an illustration of the Removal of Inhalation Valve Insert.

**NOTE:** For removal of the inhalation valve insert assembly, it is necessary to push on the inhalation valve insert assembly from the outside of the reservoir bag.

- (2) Remove the indicator, bag & lanyard assembly (50) from the facepiece assembly (10).





Removal of Inhalation Valve Insert  
Figure 301

### 3. Disassembly (Continued)

#### B. Indicator, Bag & Lanyard

Perform the following steps.

- (1) If applicable, separate the turns of the ring (80, 100) (so that there is enough space between the turns to allow the cord or pin to pass) and twist it off the lanyard assembly (90), the pin (110) or the lanyard on the bag assembly (50).
- (2) If applicable, remove any other rings in the same manner except the non-replaceable solid ring (100B).



### 3. Disassembly (Continued)

#### B. Indicator, Bag & Lanyard (Continued)

**CAUTION: IF A LONGITUDINAL CUT IS MADE INTO THE END OF THE TUBING OF THE BAG ASSEMBLY WHEN REMOVING A FLOW INDICATOR, MAKE SURE THAT THE TUBING OF THE BAG ASSEMBLY IS NOT CUT TOO SHORT OR REPLACEMENT OF THE BAG ASSEMBLY IS REQUIRED.**

**NOTE:** Before making a longitudinal cut into the tubing of the bag assembly, measure the dimensions of the PAX Mask as given in DESCRIPTION AND OPERATION, Leading Particulars. Cutting a bag assembly too short requires replacement of the bag assembly.

**NOTE:** For removal of a flow indicator (60) from the tubing of the bag assembly, it may be necessary that you make a small longitudinal cut into the end(s) of tubing where it attaches to the flow indicator.

(3) If applicable, remove the flow indicator (60) from the bag assembly (50).

#### C. Facepiece

Perform the following steps:

- (1) If applicable, cut and remove a damaged or distorted elastic strap (20) from the facepiece assembly (10) and discard the elastic strap.
- (2) If applicable, separate the turns of the ring (80, 100) (so that there is enough space between the turns to allow the facepiece attachment or cord to pass through) and twist it off of the facepiece assembly (10), the lanyard assembly (90), the cord (120), or the stringer (130).
- (3) If applicable, separate the turns of the other ring (100) (so that there is enough space between the turns) and twist it off the pin (110) or the other end of the lanyard assembly (90).



## CLEANING

### 1. General

This section describes the materials and the procedures necessary for cleaning the 289-801 Series Passenger Oxygen Mask Assemblies (PAX Masks). Before cleaning the PAX Masks, the applicable steps in the DISASSEMBLY section of this manual must be completed. Refer to the ILLUSTRATED PARTS LIST section of this manual for the item numbers given in parentheses.

**NOTE:** Unless otherwise noted, any use of an item number in this section includes all alpha variants and dashed variants (i.e., items not shown) of that number. For example, item (90) includes 90, -90, 90A thru 90L.

### 2. Special Tools and Equipment

There are no special tools or equipment required for cleaning of the PAX Masks.

### 3. Cleaning Materials

**WARNING:** ALL PROCEDURES DESCRIBED IN THIS MANUAL SHALL BE PERFORMED IN AN AREA FREE OF DUST, LINT, FINE METAL FILINGS, OIL, GREASE, FLAMMABLE SOLVENTS OR OTHER COMBUSTIBLE MATERIALS. THESE MATERIALS MAY CONTAMINATE THE PAX MASK AND CAUSE A MALFUNCTION RESULTING IN SERIOUS PERSONAL INJURY OR DEATH.

**WARNING:** SUITABLE EYE PROTECTION SHALL BE WORN TO PREVENT ACCIDENTAL EYE INJURIES.

Cleaning materials are shown in Table 401. Equivalent materials may be substituted.

**Table 401**  
**Cleaning Materials**

MATERIAL	DESCRIPTION	MANUFACTURER (VENDOR CODE)
Isopropyl Alcohol	-----	Commercially Available
Disposable, Lint-free, Cotton Gauze or Cloth	-----	Commercially Available
Disinfectant	Benzalkonium Chloride P/N 1451B (SPN 00-2572)*	Medical Chemical Corp. Santa Monica, CA 90404-5057 USA (V64681)
Dusting Powder	Neo-Novacite (SPN 00-736)*	Malvern Minerals Hot Springs, AR 71902-6218 USA (V8B756)
Distilled Water	-----	Commercially Available
Mild Household Detergent	(e.g., Dove**)	Commercially Available
* Scott Part Number (SPN); this item may be ordered from Scott using the number given.		
**Dove® is a registered trademark of Lever Brothers Company, Pine Brook, NJ 07058 USA		



#### 4. Cleaning

The following steps give the details for cleaning of the PAX Masks. Unless a different note is given, all cleaning procedures apply equally to all PAX Masks. Perform the steps in the following paragraphs.

##### A. General Cleaning

**CAUTION: DO NOT USE DISTILLED WATER THAT EXCEEDS 160 °F (71 °C) ON THE PAX MASKS OR DAMAGE TO THE PAX MASKS MAY OCCUR.**

- (1) Mix a detergent solution of warm distilled water and mild household detergent and apply it to a clean, disposable, lint-free cloth. Mix the detergent solution using 1 gallon of distilled water to one-half teaspoon of mild household detergent (approximately 4 liters of water to 2.5 milliliters of mild household detergent). Using the cloth with the detergent solution on it, clean the exterior surfaces of the facepiece assembly (10) and bag assembly (50) as required.
- (2) Flush the facepiece assembly (10) and bag assembly (50) with distilled water for removal of the detergent solution.
- (3) Shake the excess water from the facepiece assembly (10) and bag assembly (50) and dry it using clean, dry, oil-free air.

**CAUTION: IF ISOPROPYL ALCOHOL IS USED FOR CLEANING THE PAX MASK, MAKE SURE THAT IT IS COMPLETELY REMOVED FROM THE PAX MASK USING CLEAN, DRY, OIL-FREE AIR.**

- (4) If there are contaminants or dirt that cannot be easily removed, a 70 percent alcohol solution (by volume) may be applied to a clean, disposable, lint-free cloth for cleaning the exterior surfaces of the PAX Mask. Mix approximately 10 fluid ounces (300 milliliters) of isopropyl alcohol to 4.25 fluid ounces (125 milliliters) of water for a 70 percent alcohol solution. Remove any excess alcohol solution from the exterior surfaces of the PAX Mask using clean, dry, oil-free air.

##### B. Disinfecting

**WARNING: BEFORE USING BENZALKONIUM CHLORIDE, REFER TO THE APPLICABLE MATERIAL SAFETY DATA SHEET (MSDS) FOR MORE PRECAUTIONARY DATA, APPROVED SAFETY EQUIPMENT AND EMERGENCY MEDICAL AID OR PERSONAL INJURY MAY RESULT.**

- (1) Mix a disinfectant solution of approximately 15 fluid ounces (450 milliliters) of disinfectant to 5 fluid ounces (150 milliliters) of distilled water and apply it to a clean, disposable, lint-free cloth. Wipe the complete facepiece assembly (10) with the cloth and disinfectant solution.

**NOTE: It is very important that you apply the disinfectant solution to the inside and the outside of the facepiece assembly (10).**

- (2) Shake any excess disinfectant solution from the facepiece assembly (10) and dry it using clean, dry, oil-free air.



#### 4. Cleaning (Continued)

##### C. Final Preparation

- (1) Visually check that all water, detergent solution and disinfectant solution is out of the facepiece assembly (10).
- (2) Apply neo-novacite powder to a clean, dry, disposable, lint-free cloth and lightly apply the powder to the inside and outside of the facepiece assembly (10). Shake any excess powder out of the inside of the facepiece assembly.



## CHECK

### 1. General

This section describes the check procedures for the 289-801 Series Passenger Oxygen Mask Assemblies (PAX Masks). After disassembly and cleaning of any part, the part must be visually checked before it can be used during assembly. If a part is damaged, defective, deteriorated, or is not serviceable, replace the part.

Scott Aviation recommends a yearly visual inspection of the PAX Mask for the first three (3) years and a more frequent visual inspection after three (3) years. The recommended maximum shelf life of the PAX Mask is three years.

The instructions in this section apply to all PAX Masks unless otherwise noted. Refer to the ILLUSTRATED PARTS LIST section of this manual for the item numbers given in parentheses.

**NOTE:** Any use of an item number in this section includes all alpha variants and dashed variants (items not illustrated) of that number unless otherwise noted. For example, (90) includes 90, -90, 90A thru 90L.

### 2. PAX Mask

Check the PAX Mask for the following:

- A. Look for any apparent damage (e.g. holes) to the PAX Mask.
- B. Look for color change due to aging of any material that deteriorates over time (e.g., the tubing or reservoir bag of the bag assembly (50), or facepiece assembly (10) of the PAX Mask).
- C. Look for contamination on the inside or outside of any part of the PAX Mask. Refer to the CLEANING section in this manual when cleaning exterior parts that have contamination. If the contamination cannot be removed or the contamination is on the internal parts (e.g., inside the bag assembly (50)), replace the PAX Mask.
- D. Feel the surfaces of the PAX Mask and make sure they are not tacky or do not crack when touched.
- E. Look for damage or distortion of the rings (80, 100).
- F. Look for damage or deterioration of the lanyard assembly (90).
- G. Look for damage or too much wear to the pin (110).
- H. Look for damage or deterioration of the stringer (130).
- J. Indicator, Lanyard and Bag Assembly
  - (1) Look for holes in the bag, tubing or at any of the connections of the bag assembly (50). If a longitudinal cut was made in the end of the tubing for the removal of a component or assembly and there is still a cut, cut off the end of the tubing with the longitudinal cut. Make sure that the length of the tubing is not too short (refer to DESCRIPTION AND OPERATION, Leading Particulars). If the tubing is too short after the end of the tubing is cut off, replacement of the bag assembly (50) is required.



## 2. PAX Mask (Continued)

### J. Indicator, Lanyard and Bag Assembly (Continued)

- (2) Make sure that the arrow on the label of the flow indicator (60) of the bag assembly (50) points to the reservoir bag (when the tubing is straight). If the flow indicator is in backwards, replace it. Make sure that when it is replaced, the arrow points to the reservoir bag (when the tubing is straight).
- (3) Look for kinks in the tubing. Straighten the tubing to remove the kinks. If the kinks in the tubing cannot be removed, replace the bag assembly (50).
- (4) Look to see if any ring (80) is damaged or bent.
- (5) Look for damage or deterioration of the lanyard assembly (70) that is attached to the bag assembly (50).

### K. Inhalation Valve Insert Assembly

- (1) Look to see that the flapper (40) is aligned inside the inhalation valve insert assembly (30). If the flapper does not lay flat against the sealing surface of the inhalation valve insert assembly, carefully align the flapper.
- (2) Look for any damage or deterioration of the flapper (40). If there is damage or deterioration of the flapper, replacement of the inhalation valve insert assembly (30) is required.
- (3) Look for damage or cracks to the inhalation valve insert assembly (30).

### L. Facepiece Assembly

- (1) Look for contamination of the facepiece assembly (10). Refer to the CLEANING section when removing the contamination. If it is not serviceable, replace the facepiece assembly.
- (2) Make sure that the facepiece assembly (10) is free of any objectionable smell. If the facepiece assembly has an objectionable smell, refer to the CLEANING section in this manual when cleaning, and disinfecting.
- (3) Look for damage or too much extension of the elastic strap (20).
- (4) Look for damage or distortion on the inside and outside of the facepiece assembly (10).
- (5) Look to see that the flapper is aligned inside the ambient flapper valve (the valve that has a spring) of the facepiece assembly (10). If the flapper does not lay flat against the sealing surface of the ambient flapper valve assembly, carefully align the flapper.
- (6) Look for damage or deterioration of the flapper inside the ambient flapper valve (the valve that has a spring) of the facepiece assembly (10). Replacement of the facepiece assembly is required to replace the flapper.



## REPAIR

### 1. General

This section describes the repair procedures for the 289-801 Series Passenger Oxygen Mask Assemblies (PAX Masks). Before repair of the PAX Masks, the CHECK section of this document must be completed.

### 2. Repair

Repair of the PAX Masks includes only the steps below:

- A. Cleaning
- B. Replacement of damaged, defective, missing or incorrect components.

## ASSEMBLY

### 1. General

This section describes the equipment and procedures necessary for assembly of the 289-801 Series Passenger Oxygen Mask Assemblies (PAX Mask). Before assembly of the PAX Mask, the CHECK and CLEANING sections of this manual must be completed. The instructions given in this section apply to all PAX Masks unless otherwise noted. Refer to the ILLUSTRATED PARTS LIST section for item numbers given in parentheses.

**NOTE:** Any use of an item number in this section includes all alpha variants and dashed variants (items not illustrated) of that number unless otherwise noted. For example, (90) includes 90, -90, 90A thru 90L.

### 2. Special Tools and Equipment

A list of special tools required for assembly of the PAX Masks is given in Table 701. Equivalent tools may be used for the listed items.

**Table 701**  
**Special Tools and Equipment**

PART NAME	PART NUMBER	MANUFACTURER (Vendor Code)
Inhalation Valve Insertion Tool	T-12372	Scott Aviation Lancaster, NY 14086-9502 USA (V53655)
Tubing Pliers	T-28314-S91-11	

### 3. Pre-Assembly Requirements

Any assembly of a PAX Mask or its components must be done in an area that is free from dust, lint, petroleum-based products, flammable solvents or other combustible materials.

### 4. Assembly

**WARNING:** ALL PROCEDURES DESCRIBED IN THIS MANUAL SHALL BE PERFORMED IN AN AREA FREE OF DUST, LINT, FINE METAL FILINGS, OIL, GREASE, FLAMMABLE SOLVENTS OR OTHER COMBUSTIBLE MATERIALS. THESE MATERIALS MAY CONTAMINATE THE PAX MASK AND CAUSE A MALFUNCTION RESULTING IN SERIOUS PERSONAL INJURY OR DEATH.

**WARNING:** DO NOT USE ANY LUBRICANT OR WETTING AGENT FOR ATTACHING A COMPONENT OR ITEM TO A SECTION OF TUBING. THE COMPONENT OR ITEM MAY SEPARATE FROM THE TUBING AND CAUSE A MALFUNCTION OF THE PAX MASK RESULTING IN SERIOUS PERSONAL INJURY OR DEATH.

**WARNING:** SUITABLE EYE PROTECTION SHALL BE WORN TO PREVENT ACCIDENTAL EYE INJURIES.

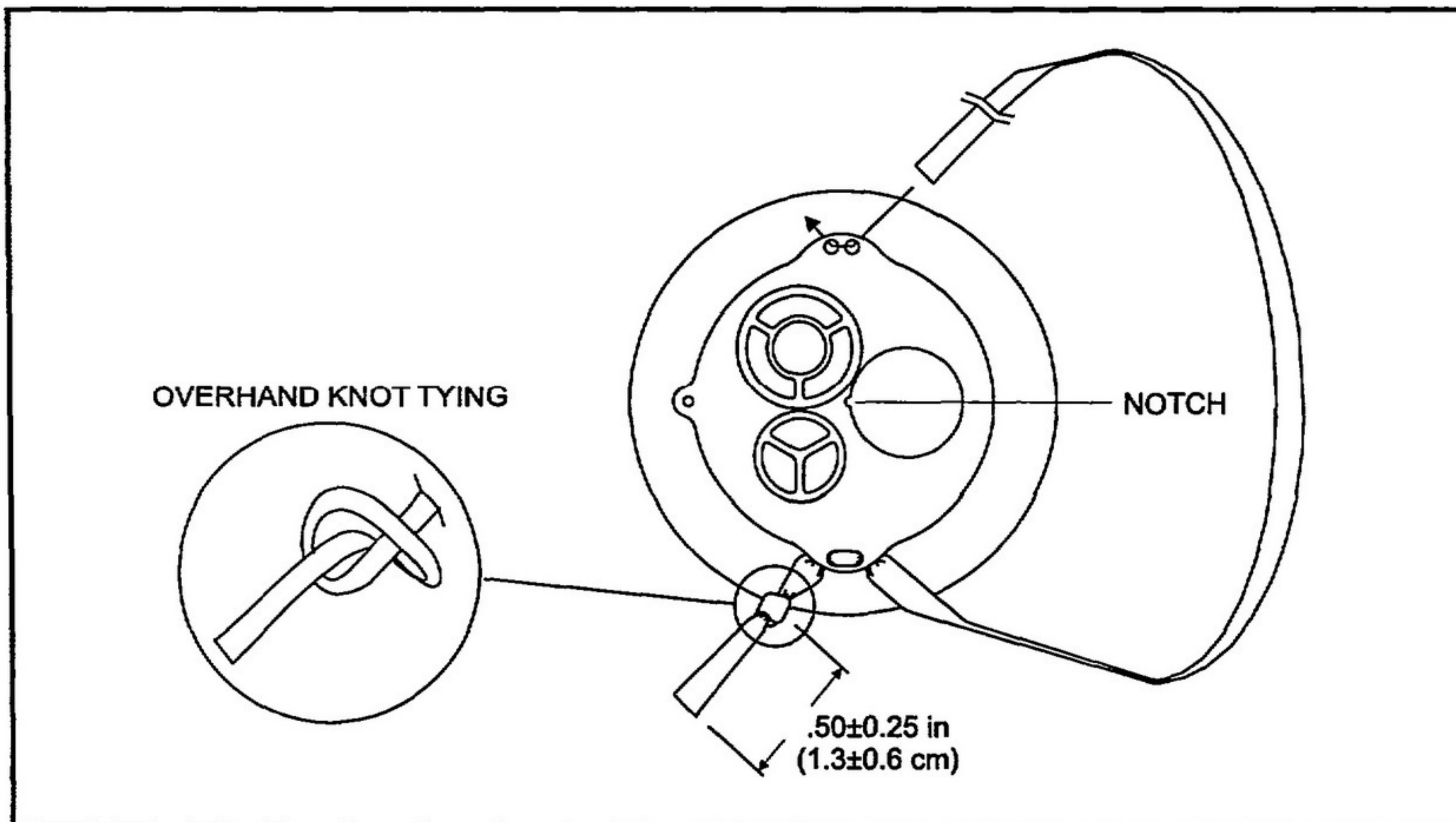


#### 4. Assembly (Continued)

##### A. Facepiece

Do the following assembly steps for the facepiece assembly.

- (1) Install the elastic strap (20) as follows: (Refer to Figure 701, Facepiece & Elastic Strap.)
  - (a) Insert one end of the elastic strap (20) up through one hole and down through the other hole, on one side of the facepiece assembly (10).
  - (b) Refer to Figure 701 and put an overhand knot a distance of  $0.50 \pm 0.25$  inch ( $1.3 \pm 0.6$  cm) from the end of the elastic strap (20) that was just installed. This overhand knot will stop the elastic strap from pulling out of the facepiece assembly (10).
  - (c) Repeat steps (a) and (b) above to install the other end of the elastic strap (20) into the opposite side of the facepiece assembly (10).
- (2) If applicable, separate the turns of the ring (100) (so that there is enough space between the turns) and twist the ring onto the facepiece assembly (10), and the lanyard assembly (90), or the cord (120).
- (3) If applicable, separate the turns of the ring (100) (from the previous step) and twist the stringer (130) onto the ring.
- (4) If applicable, separate the turns of the other ring (100) (so that there is enough space between the turns) and twist it onto the pin (110) or the other end of the lanyard assembly (90).



Facepiece & Elastic Strap  
Figure 701



#### 4. Assembly (Continued)

##### B. Indicator, Bag & Lanyard

Do the following assembly steps for the indicator, bag & lanyard assembly (50) (referred to as bag assembly).

- (1) If applicable, separate the turns of the ring (80) (so that there is enough space between the turns) and twist it onto the bag assembly (50).

**WARNING: DO NOT USE ANY LUBRICANT OR WETTING AGENT FOR ATTACHING A COMPONENT OR ITEM TO A SECTION OF TUBING. THE COMPONENT OR ITEM MAY SEPARATE FROM THE TUBING AND CAUSE A MALFUNCTION OF THE PAX MASK RESULTING IN SERIOUS PERSONAL INJURY OR DEATH.**

**NOTE:** Before attaching the flow indicator (60), it may be necessary to stretch the inside diameter of the tubing with the tubing pliers in the area where it attaches to the flow indicator.

**WARNING: WITH THE TUBING STRAIGHT, MAKE SURE THAT THE ARROW ON THE FLOW INDICATOR POINTS TO THE RESERVOIR BAG OF THE BAG ASSEMBLY, OR MALFUNCTION OF THE PAX MASK WILL OCCUR RESULTING IN PERSONAL.**

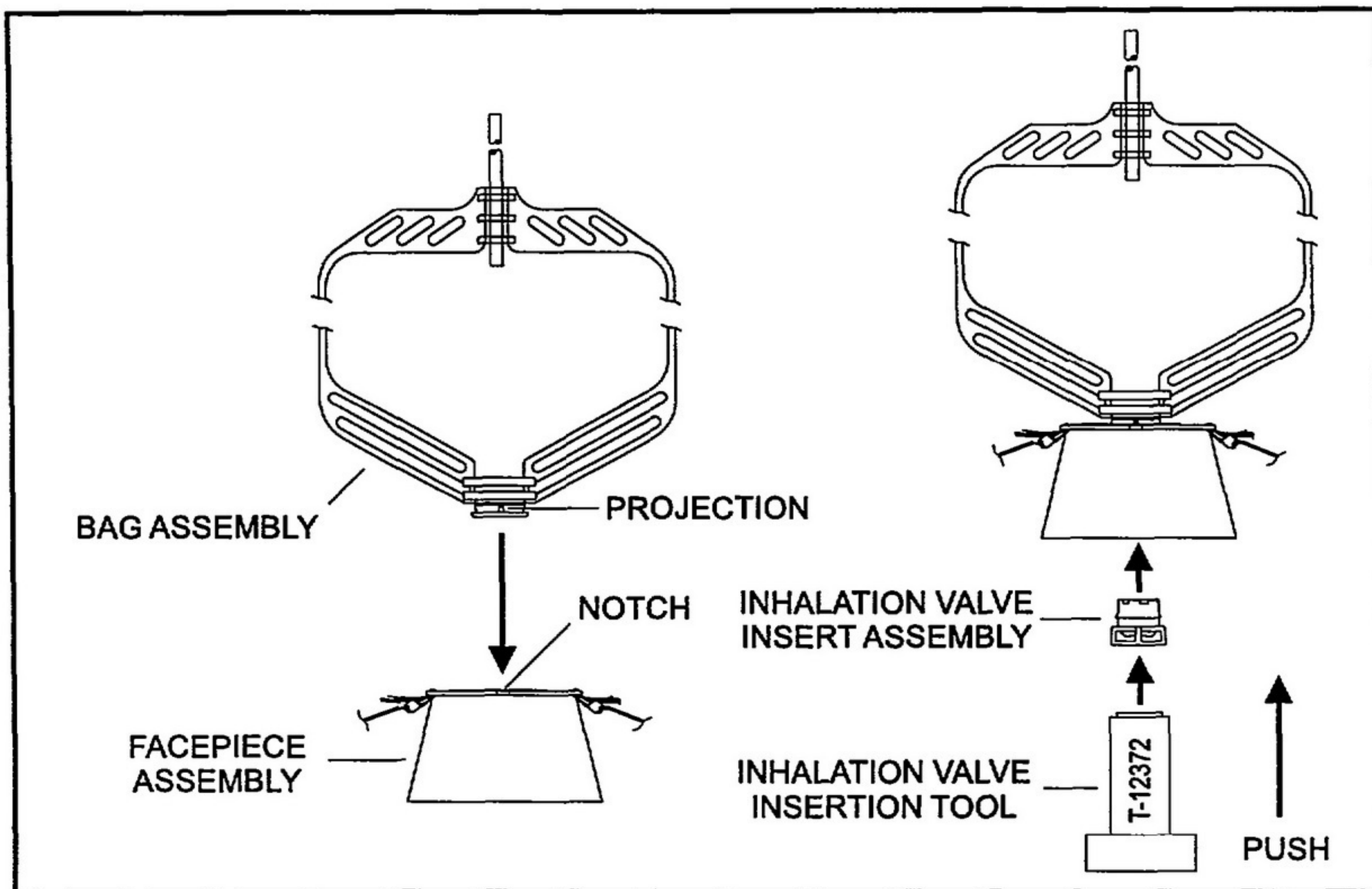
- (2) If applicable, install the ends of the flow indicator (60) fully into the ends of the tubing of the bag assembly (50) with the arrow pointing to the reservoir bag of the bag assembly with the tubing straight. If necessary, use the tubing pliers (Table 701) to stretch the tubing so that it will fit over the ends of the flow indicator. Make sure that the flow indicator is installed at the correct dimensions given in the DESCRIPTION AND OPERATION section, Leading Particulars and is installed in the correct direction.

##### C. Final Assembly

Do the following assembly steps for the PAX Mask.

- (1) Refer to Figure 702, Bag & Inhalation Valve Assembly, and attach the bag assembly (50) to the facepiece assembly (10) as follows:
  - (a) Hold the bag assembly (50) and push the end of the bag (end opposite the tubing) through the hole in the facepiece assembly (10) that has the notch (also shown in figure 701).
  - (b) Make sure that the projection on the bag assembly (50) is aligned with the notch in the hole of the facepiece assembly (10). Push and engage the end of the bag assembly in the hole of the facepiece assembly.
  - (c) Using the Inhalation Valve Insertion Tool, push the inhalation valve insert assembly (30) into the facepiece assembly (10) and the end of the bag assembly (50). Make sure that the inhalation valve insert assembly is fully engaged in the facepiece assembly.





Bag and Inhalation Valve Assembly  
Figure 702

4. Assembly (Continued)

C. Final Assembly (Continued)

**WARNING: THE FLAPPERS IN THE INHALATION VALVE INSERT ASSEMBLY AND THE FACEPIECE ASSEMBLY MUST BE ALIGNED CORRECTLY AND MUST NOT BE DAMAGED OR THE PAX MASK WILL MALFUNCTION RESULTING IN INJURY OR DEATH.**

- (2) Visually check the flapper (40) of the inhalation valve insert assembly (30) and the flapper inside the ambient flapper valve (the valve that has the spring) of the facepiece assembly (10). Make sure that the flappers are installed with the edges of the flappers flat against the sealing surface of the inhalation valve assembly and the ambient flapper valve. If the edges of the flappers are not flat against the sealing surface of the inhalation valve assembly and the ambient flapper valve, carefully move the edges of the flapper flat against the sealing edge of the assembly. Make sure that the flappers are not damaged. If a flapper is damaged, replace the assembly that contains it.
- (3) Refer to the DESCRIPTION AND OPERATION section, Leading Particulars and make sure that all dimensions of the PAX Mask are within the specified tolerances as given in the applicable figure.
- (4) Refer to the TESTING & FAULT ISOLATION section and perform the testing procedures given.



#### 4. Assembly (Continued)

##### D. Mask Repacking

**WARNING: IF PAX MASK REPACKING INSTRUCTIONS ARE GIVEN IN THE AIRCRAFT MAINTENANCE MANUAL, THOSE INSTRUCTIONS MUST BE FOLLOWED OR THE INTENDED USER OF THE MASK MAY BE INJURED.**

Fold the PAX Mask using the directions from the applicable aircraft maintenance manual. If there are no directions available, follow the steps in this paragraph. Refer to Figure 703 for illustrations of the steps below.

- (1) Put the large diameter of the facepiece assembly (10) down on a clean, flat, lint-free surface and spread the bag assembly (50) out flat.
- (2) Fold one third (side 1) of the reservoir bag of the bag assembly (50) over the center of the bag parallel to the tubing.
- (3) Fold the other one third (side 2) of the reservoir bag over the first folded side even with the outer edge of side 1.
- (4) Holding the reservoir bag in the folded position, turn the PAX Mask over and fold the elastic strap (20) into the facepiece assembly (10).
- (5) Take the folded reservoir bag and bend it up and over the side of the facepiece assembly (10), and then fold the reservoir bag into the bottom of the facepiece assembly with the tubing facing out.
- (6) Coil the tubing loosely inside the facepiece assembly (10), clockwise in direction.

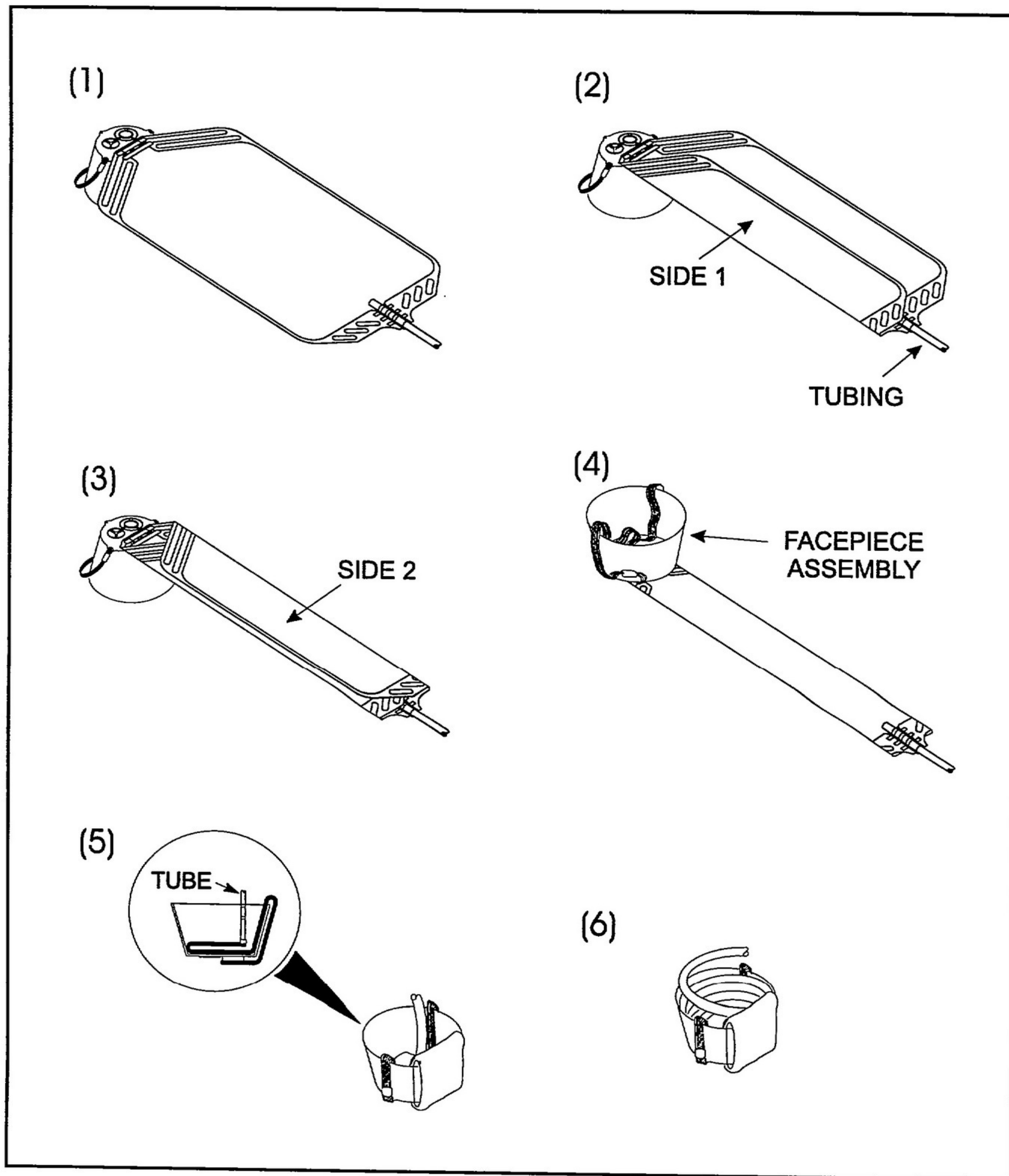
**NOTE:** Any attached lanyard must not be folded inside the packed mask but must be kept available for attachment.

**NOTE:** Any attached stringer must not be folded inside the packed mask but must be kept on top.

#### 5. Storage

- A. Place the folded PAX Mask into a clean, transparent, polyethylene bag (5.5 inches (12.7 cm) wide X 10.0 inches (25.4 cm) long X 4 mil. (0.025 mm) thick, or equivalent) and seal it to protect the unit from dust and dirt.
- B. Store in a cool area, away from sources of high heat and humidity.





Mask Repacking  
Figure 703

## FITS AND CLEARANCES

There are no fits, clearances or torque values required for the 289-801 Series Passenger Oxygen Mask Assemblies (PAX Masks). Tolerances for the different lengths of the PAX Masks are given in DESCRIPTION AND OPERATION, Leading Particulars in this manual.



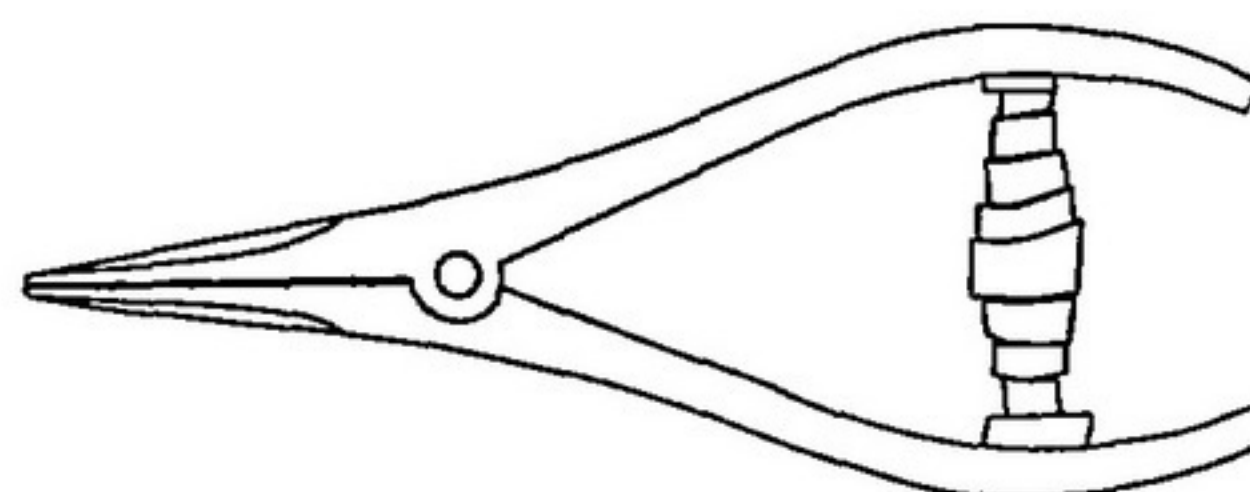
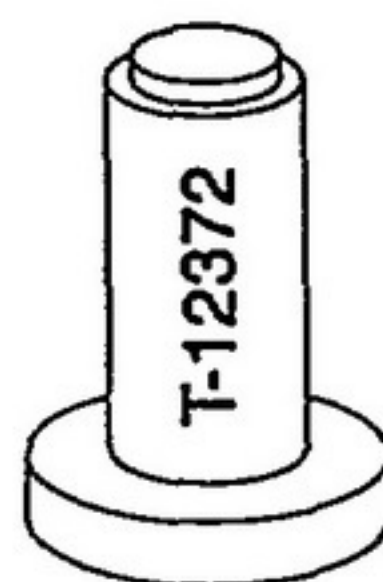
## SPECIAL TOOLS, FIXTURES AND TEST EQUIPMENT

Special tools, fixtures and test equipment required for this Component Maintenance Manual (CMM) are given in Table 901. Special tools manufactured by Scott Aviation are shown in Figure 901. Equivalent tools, fixtures and test equipment may be used for the listed items.

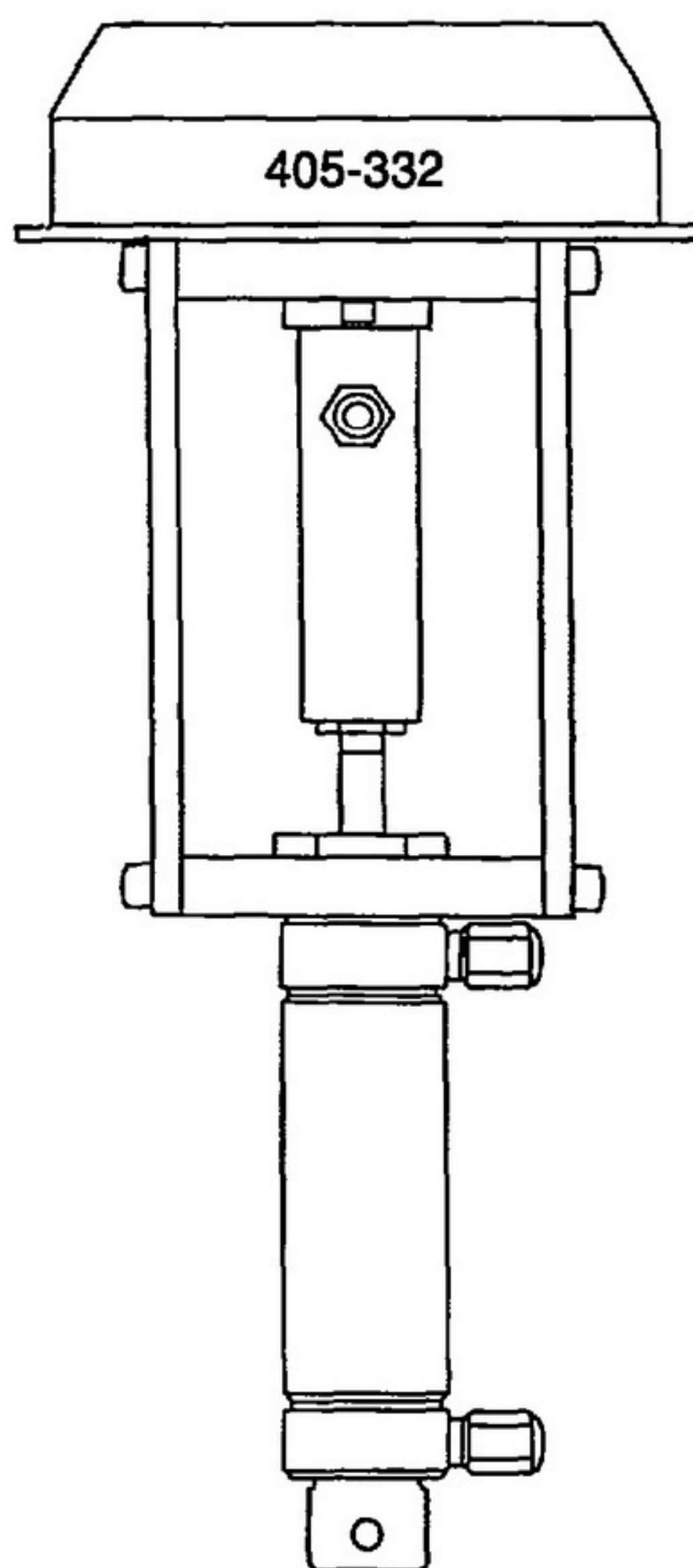
**Table 901**  
**Special Tools, Fixtures and Test Equipment**

QTY	PART NAME	NUMBER	MANUFACTURER
1	Flow Control Valve (1/2 inch NPT fittings)	Model Number B18VF8	Whitey Co. Highland Heights, OH 44143-1533 USA (V12623)
1	Flowmeter (9.1 to 91 slpm)	Model Number 1110CJ32CBGAA	Emerson Electric Co. Brooks Instrument Div. Hatfield, PA 19440-3052 USA (V91556)
1	Flowmeter (0.1 to 1.1 slpm)	Model Number 1110CC01BBGAA	
1	Force Gauge 0 to 30 pound force (0 to 133 N)	Model Number DPP 30 or DPP200N DPP 30 = 30 pound force max. DPP 200N = 200 Newtons max.	John Chatillon & Sons, Inc. Greensboro, NC 27409-9696 USA (V1CN79)
1	Inhalation Valve Insertion Tool	T-12372	Scott Aviation Lancaster, NY 14086-9502 USA (V53655)
1	Manometer 0 to 3.0 in H <sub>2</sub> O (0 to 750 Pa)	Model Number 2003 (Magnehelic <sup>®</sup> Gage)	Dwyer Instrument Inc. Michigan City, IN 46360-0373 USA (V85274)
1	Pinch Clamp	-----	Commercially Available
1	Mask Fixture	P/N 405-332	Scott Aviation Lancaster, NY 14086-9502 USA (V53655)
1	Pressure Gauge 0 to 15 psig (0 to 103 kPa)	Model 508 Series	Ametek, Inc.; U.S. Gauge Div. Sellersville, PA 18960-2625 USA (V61349)
1	Pressure Gauge 0 to 160 psig (0 to 1103 kPa)	Model 1408 Series	
1	Regulator, Air Pressure 0 to 25 psig (0 to 172 kPa)	P/N 100321	Vemco Corp. San Dimas, CA 91773-2925 USA (V62527)
1	Test Gas Regulator 0 to 10 psig (0 to 69 kPa)	P/N 100320	
1	Tubing Pliers	T-28314-S91-11	Scott Aviation Lancaster, NY 14086-9502 USA (V53655)

\* Magnehelic<sup>®</sup> is a Registered tradename of Dwyer Instrument Inc., Michigan City, IN, USA



T-28314-S91-11



Special Tools  
Figure 901



## ILLUSTRATED PARTS LIST

### 1. Introduction

This Illustrated Parts List section shows the illustrations and the authorized replacement parts for the 289-801 Series Passenger Oxygen Mask Assemblies.

#### A. How to use this section of the Component Maintenance Manual (CMM):

- (1) If you do not know the part number you need:
  - (a) Find the part in the applicable figure.
  - (b) Note the number used for the part.
  - (c) Refer to the number in the FIG. ITEM column and find the part number for the Scott authorized replacement part in the PART NUMBER column.
- (2) If you know the part number, refer to the appropriate figure that shows the part; and make sure that the part in the illustration is the same part that you need. Refer to the Numerical Index for the number of the appropriate figure if it is not known.

#### B. Numerical Index

The Numerical index is used to locate parts in the illustration(s) when only the part number of a component or assembly is known. The Numerical Index is a cross-reference of numbers that includes: Part Number, Airline Stock Number, Figure Number, Item Number, and the Total Required.

The character-sort-order for part numbers is: dashes first, letters A thru Z next, and then numbers 0 thru 9.

#### C. Description of the Illustrated Parts List Entries

This section describes the information found in the Illustrated Parts List (IPL).

##### (1) FIG. ITEM

###### (a) Items not Illustrated

Items that are not shown in the figure have a dash in front of the item number.

###### (b) Alpha Variant Item Numbers

Alpha variants that have letters A thru Z (except I and O) that are added after the item number show configuration differences in items, optional parts, parts that have been improved, or added items.

##### (2) PART NUMBER

The numbers in this column are the part numbers that Scott gives to an item, the original part number for an item that is from a vendor, or a common specification number (e.g., MIL specification number) that is used for reference of an item. If a part number that Scott gives an item is different than the vendor part number or a common specification number, the vendor number or the common specification number is shown in the PART NUMBER column and the Scott part number (SPN XXXXX) is shown in the NOMENCLATURE column.



1. Introduction (Continued)

## C. Description of the Illustrated Parts List Entries (Continued)

## (3) AIRLINE STOCK NUMBER

This column has space available for a number, up to eleven characters in length, to be written by the airline.

## (4) NOMENCLATURE

The abbreviations in this column are shown in the List of Abbreviations in this section.

The definitions of some abbreviations that are found in this column are:

NP	This is a part that is not available by itself. NP is shown in the two last spaces of the Nomenclature column.
OPT	The part is equivalent to the primary part and can be inter-changed with the primary part.

This column has the description of the part and uses the following level of indenture to show the relationship of one part to another.

123 (Assembly Number)

- Subassembly Top Number
- Attaching Parts for the Subassembly Top Number or Assembly Item  
\*\*\*
- Assembly Item

- Sub-Subassembly Top Number
- Attaching Parts for the Sub-Subassembly Top # or Subassembly Item  
\*\*\*
- Subassembly Item

NOTE: The three asterisks are used to separate the attaching parts of one Item from the following Item.

## (5) EFF. CODE

When the IPL includes more than one top assembly, each different top assembly is identified with an alpha code (A, B, C, etc.). If a part or sub-assembly is identified with an alpha code, that part can only be used in the top assembly with the same EFF. CODE.

Any part or subassembly with no EFF. CODE may be used in any top assembly.

## (6) UNITS PER ASSEMBLY

This column shows the number of parts that are used in the assembly.



1. Introduction (Continued)

## D. Vendor Codes

Vendor Codes in this section are shown in the NOMENCLATURE column of the IPL and have a "V" before the 5-digit alphanumeric number (e.g., (VFO553). The following is a list of the vendors that supply items in this section:

<u>CODE</u>	<u>NAME AND ADDRESS</u>
F0553	Intertechnique SA ZI Des Gatines 78374 Plaisir Cedex, France
81205	The Boeing Co. Seattle, WA 98124-2499 U.S.A.

## E. List of Abbreviations:

The following is a list of abbreviations found in this section:

<u>ABBREV.</u>	<u>DEFINITION OF TERM</u>
&	and
#	Number
***	End of Attaching Parts
ASSY	Assembly
BAC	The Boeing Co. (formerly, Boeing Airplane Co.)
CMM	Component Maintenance Manual
e.g.	example given
EFF.	Effectivity
EROS	Equipement Respiratoire a Oxygene de Secours
FIG.	Figure
MDC	McDonnell Douglas Co.
NO.	Number
NP	Not Procurable
OPT	Optional
P/N	Part Number
P/N's	Part Numbers
REQ'D	Required
RF	Reference
SPN	Scott Part Number

1. Introduction (Continued)

F. Numerical Index:

The following is a Numerical Index for this section

PART NUMBER	AIRLINE STOCK NUMBER	FIGURE NUMBER	ITEM NUMBER	TOTAL REQ'D
00-3377		3	120	AR
10008733		1	20	1
		2	20	1
		3	20	1
		4	20	1
		5	20	1
		6	20	1
		7	20	1
10010032		5	100	2
		6	80	1
		7	80	1
		7	100	2
174-57		1	40	1
		2	40	1
		3	40	1
		4	40	1
		5	40	1
		6	40	1
		7	40	1
22829		1	110	1
289-191-19		1	90	1
289-649-1		1	100	2
		3	100	1
		4	100	2
		4	100A	1
289-680-1		4	130	1
289-682-1		4	90	1
289-682-2		4	90A	1



PART NUMBER	AIRLINE STOCK NUMBER	FIGURE NUMBER	ITEM NUMBER	TOTAL REQ'D
289-682-4		4	90B	1
289-682-5		4	90C	1
289-682-6		4	90D	1
289-682-7		4	90E	1
289-682-8		4	90F	1
289-682-9		4	90G	1
289-682-11		4	90H	1
289-682-12		4	90J	1
289-682-13		4	90K	1
289-682-14		4	90L	1
289-685		4	110	1
289-686		4	100B	1
289-770		3	110	1
289-771		3	-90	1
289-801-051		5	-1	RF
289-801-052		5	-1A	RF
289-801-053		5	-1B	RF
289-801-054		5	-1C	RF
289-801-055		5	-1D	RF
289-801-056		5	-1E	RF
289-801-057		5	-1F	RF
289-801-058		6	-1	RF
289-801-059		6	-1A	RF
289-801-060		7	-1	RF
289-801-061		7	-1A	RF
289-801-062		7	-1B	RF
289-801-063		7	-1C	RF
289-801-101		2	-1	RF
289-801-119		5	-1G	RF
289-801-120		5	-1H	RF
289-801-121		5	-1J	RF
289-801-122		5	-1K	RF

PART NUMBER	AIRLINE STOCK NUMBER	FIGURE NUMBER	ITEM NUMBER	TOTAL REQ'D
289-801-235		3	-1	RF
289-801-236		5	-1L	RF
289-801-237		5	-1M	RF
289-801-238		6	-1B	RF
289-801-239		6	-1C	RF
289-801-240		5	-1N	RF
289-801-241		6	-1D	RF
289-801-50		1	-1	RF
289-801-724-1A		4	-1	RF
289-801-724-2A		4	-1A	RF
289-801-724-3A		4	-1B	RF
289-801-724-4A		4	-1C	RF
289-801-724-5A		4	-1D	RF
289-801-724-6A		4	-1E	RF
289-801-724-7A		4	-1F	RF
289-801-724-8A		4	-1G	RF
289-801-724-9A		4	-1H	RF
289-801-724-10A		4	-1J	RF
289-801-724-11A		4	-1K	RF
289-801-724-12A		4	-1L	RF
289-801-724-13A		4	-1M	RF
289-801-724-14A		4	-1N	RF
289-801-724-15A		4	-1P	RF
289-801-724-16A		4	-1Q	RF
289-801-724-17A		4	-1R	RF
289-801-724-18A		4	-1S	RF
289-830-050		1	50	1
289-830-051		5	50	1
289-830-052		5	-50A	1
289-830-053		5	-50B	1
289-830-054		5	-50C	1
289-830-055		5	-50D	1

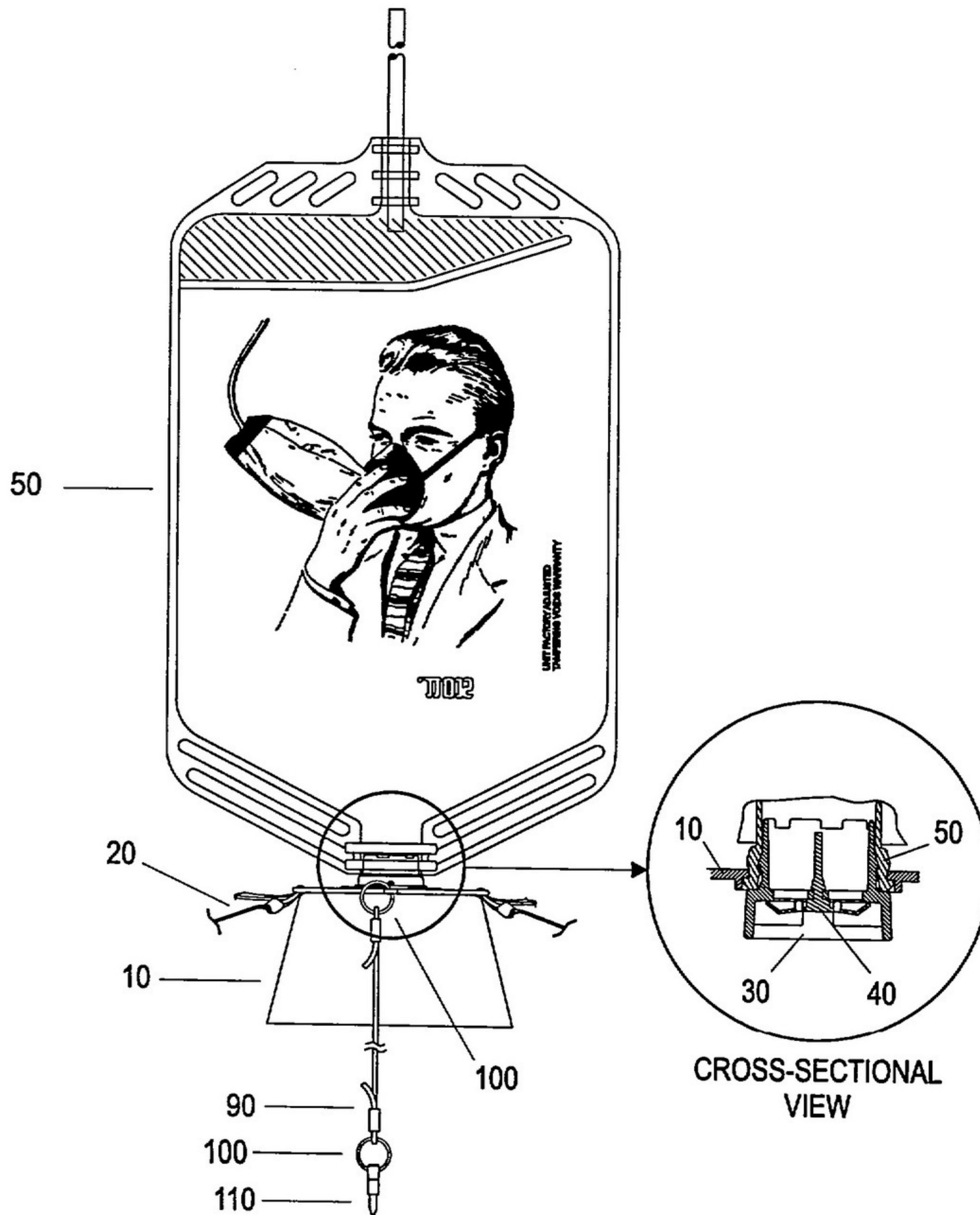


PART NUMBER	AIRLINE STOCK NUMBER	FIGURE NUMBER	ITEM NUMBER	TOTAL REQ'D
289-830-056		5	-50E	1
289-830-057		5	-50F	1
289-830-058		6	50	1
289-830-059		6	-50A	1
289-830-060		7	50	1
289-830-061		7	-50A	1
289-830-062		7	-50B	1
289-830-063		7	-50C	1
289-830-119		5	-50G	1
289-830-120		5	-50H	1
289-830-121		5	-50J	1
289-830-122		5	-50K	1
289-830-235		3	50	1
289-830-236		5	-50L	1
289-830-237		5	-50M	1
289-830-238		6	-50B	1
289-830-239		6	-50C	1
289-830-240		5	-50N	1
289-830-241		6	-50D	1
289-830-724-1A		4	50	1
289-830-724-2A		4	-50A	1
289-830-724-3A		4	-50B	1
289-830-724-4A		4	-50C	1
289-830-724-5A		4	-50D	1
289-830-724-6A		4	-50E	1
289-830-724-7A		4	-50F	1
289-830-724-8A		4	-50G	1
289-830-724-9A		4	-50H	1
289-830-724-10A		4	-50J	1
289-830-724-11A		4	-50K	1
289-830-724-12A		4	-50L	1
289-830-724-13A		4	-50M	1

PART NUMBER	AIRLINE STOCK NUMBER	FIGURE NUMBER	ITEM NUMBER	TOTAL REQ'D
289-830-724-14A		4	-50N	1
289-830-724-15A		4	-50P	1
289-830-724-16A		4	-50Q	1
289-830-724-17A		4	-50R	1
289-830-724-18A		4	-50S	1
444-12877-000-20		4	-110A	1
804256-01		1	10	1
		3	10	1
804256-01		4	10	1
		5	10	1
		6	10	1
		7	10	1
804266-05		2	50	1
804273-01		2	60	1
		5	60	1
		6	60	1
804650-01		1	30	1
		2	30	1
		3	30	1
		4	30	1
		5	30	1
		6	30	1
		7	30	1
804876-02		5	90	1
804876-03		5	-90A	1
		7	90	1
804876-05		5	-90B	1
804876-08		5	-90C	1
804876-09		5	-90D	1
804876-14		5	-90E	1
		7	90A	1
804876-20		5	-90F	1



PART NUMBER	AIRLINE STOCK NUMBER	FIGURE NUMBER	ITEM NUMBER	TOTAL REQ'D
804876-21		5	-90G	1
804909-02		6	70	1
804909-03		6	-70A	1
804909-04		6	-70B	1
804909-05		6	-70C	1
		7	70	1
804909-07		6	-70D	1

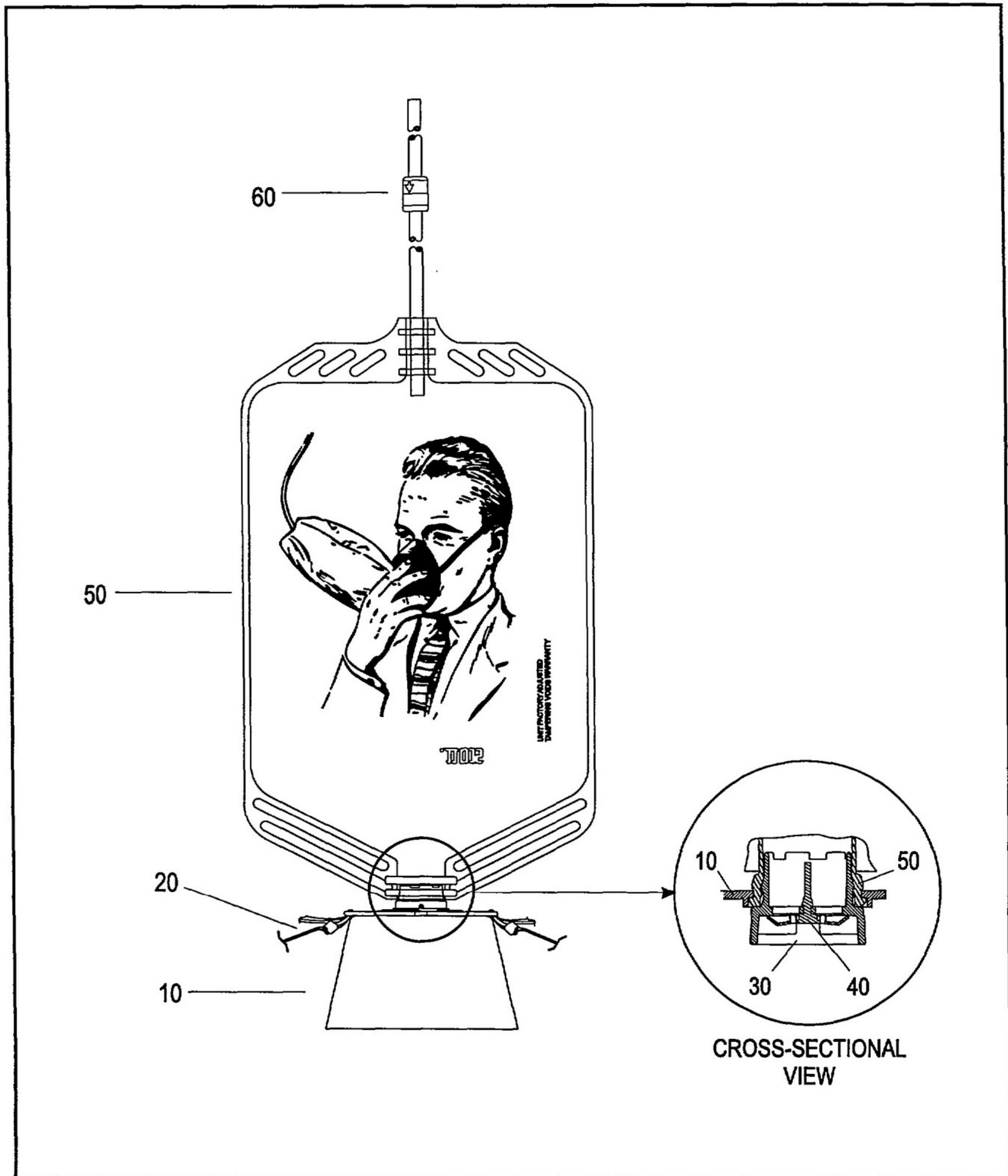


Passenger Oxygen Mask Assembly  
Figure 1



FIG. ITEM	PART NUMBER	AIRLINE STOCK NO.	NOMENCLATURE 1234567	EFF. CODE	UNITS PER ASSY
1-					
-1	289-801-50		MASK ASSY, PASSENGER OXYGEN	A	RF
10	804256-01		• FACEPIECE ASSY		1
20	10008733		•• STRAP, ELASTIC		1
30	804650-01		• INSERT ASSY, INHALATION VALVE		1
40	174-57		•• FLAPPER NP		1
50	289-830-050		• BAG ASSY, INDICATOR & LANYARD		1
			ITEM NUMBERS 60 THRU 80 SKIPPED		
90	289-191-19		• LANYARD ASSY		1
100	289-649-1		•• RING		2
110	22829		• PIN		1

- ITEM NOT ILLUSTRATED

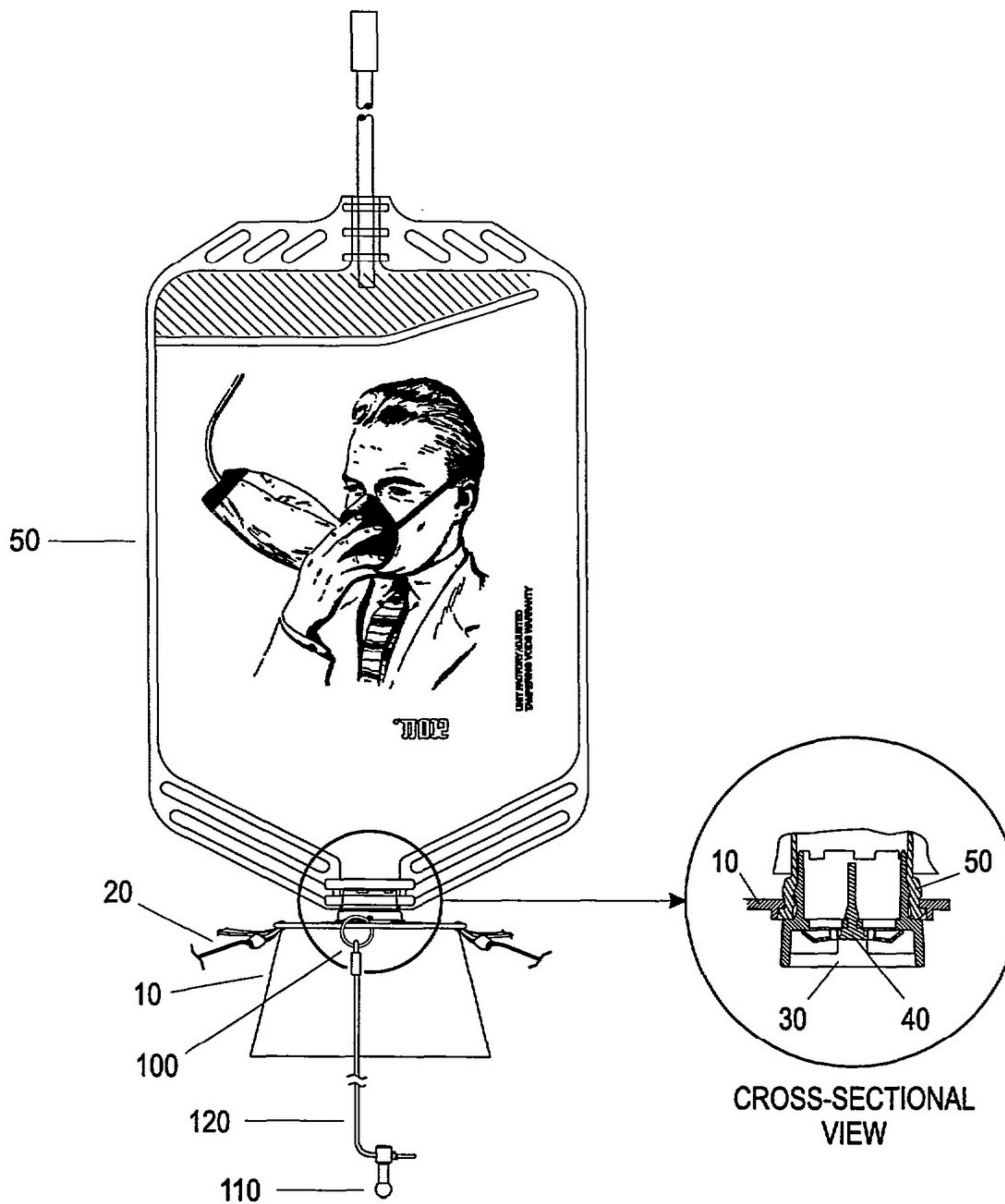


Passenger Oxygen Mask Assembly  
Figure 2



FIG. ITEM	PART NUMBER	AIRLINE STOCK NO.	NOMENCLATURE 1234567	EFF. CODE	UNITS PER ASSY
2- -1	289-801-101		MASK ASSY, PASSENGER OXYGEN	A	RF
10	804256-01		• FACEPIECE ASSY		1
20	10008733		•• STRAP, ELASTIC		1
30	804650-01		• INSERT ASSY, INHALATION VALVE		1
40	174-57		•• FLAPPER NP		1
50	804266-05		• BAG ASSY, WITH INDICATOR		1
60	804273-01		•• INDICATOR, FLOW		1

- ITEM NOT ILLUSTRATED

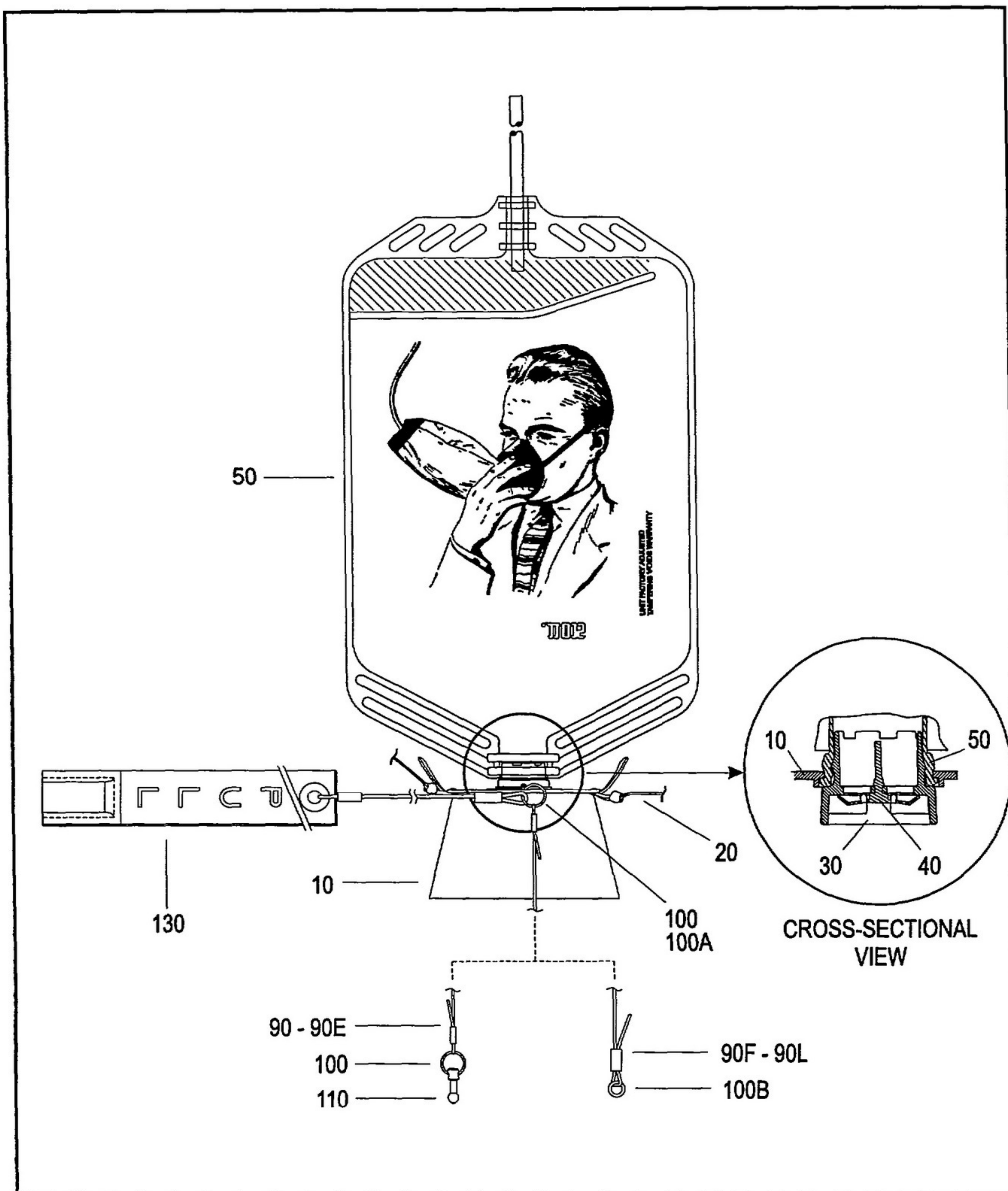


Passenger Oxygen Mask Assembly  
Figure 3



FIG. ITEM	PART NUMBER	AIRLINE STOCK NO.	NOMENCLATURE 1234567	EFF. CODE	UNITS PER ASSY
3- -1	289-801-235		MASK ASSY, PASSENGER OXYGEN (EROS P/N 441279)	A	RF
10	804256-01		• FACEPIECE ASSY		1
20	10008733		•• STRAP, ELASTIC		1
30	804650-01		• INSERT ASSY, INHALATION VALVE		1
40	174-57		•• FLAPPER NP		1
50	289-830-235		• BAG ASSY WITH INDICATOR		1
			ITEM NUMBERS 60 THRU 80 SKIPPED		
-90	289-771		• LANYARD ASSY		1
100	289-649-1		•• RING		1
110	289-770		•• PIN NP		1
120	00-3377		•• CORD NP		AR

- ITEM NOT ILLUSTRATED



Passenger Oxygen Mask Assembly  
Figure 4



FIG. ITEM	PART NUMBER	AIRLINE STOCK NO.	NOMENCLATURE 1234567	EFF. CODE	UNITS PER ASSY
4-					
-1	289-801-724-1A		MASK ASSY, PASSENGER OXYGEN (EROS P/N MW 40-01)	A	RF
-1A	289-801-724-2A		MASK ASSY, PASSENGER OXYGEN (EROS P/N MW 40-02)	B	RF
-1B	289-801-724-3A		MASK ASSY, PASSENGER OXYGEN (EROS P/N MW 40-03)	C	RF
-1C	289-801-724-4A		MASK ASSY, PASSENGER OXYGEN (EROS P/N MW 40-04)	D	RF
-1D	289-801-724-5A		MASK ASSY, PASSENGER OXYGEN (EROS P/N MW 40-05)	E	RF
-1E	289-801-724-6A		MASK ASSY, PASSENGER OXYGEN (EROS P/N MW 40-06)	F	RF
-1F	289-801-724-7A		MASK ASSY, PASSENGER OXYGEN (EROS P/N MW 40-07)	G	RF
-1G	289-801-724-8A		MASK ASSY, PASSENGER OXYGEN (EROS P/N MW 40-08)	H	RF
-1H	289-801-724-9A		MASK ASSY, PASSENGER OXYGEN (EROS P/N MW 40-09)	J	RF
-1J	289-801-724-10A		MASK ASSY, PASSENGER OXYGEN (EROS P/N MW 40-10)	K	RF
-1K	289-801-724-11A		MASK ASSY, PASSENGER OXYGEN (EROS P/N MW 40-11)	L	RF
-1L	289-801-724-12A		MASK ASSY, PASSENGER OXYGEN (EROS P/N MW 40-12)	M	RF
-1M	289-801-724-13A		MASK ASSY, PASSENGER OXYGEN (EROS P/N MW 40-13)	N	RF
-1N	289-801-724-14A		MASK ASSY, PASSENGER OXYGEN (EROS P/N MW 40-14)	P	RF
-1P	289-801-724-15A		MASK ASSY, PASSENGER OXYGEN (EROS P/N MW 40-15)	Q	RF
-1Q	289-801-724-16A		MASK ASSY, PASSENGER OXYGEN (EROS P/N MW 40-16)	R	RF
-1R	289-801-724-17A		MASK ASSY, PASSENGER OXYGEN (EROS P/N MW 40-17)	S	RF
-1S	289-801-724-18A		MASK ASSY, PASSENGER OXYGEN (EROS P/N MW 40-18)	T	RF
10	804256-01		• FACEPIECE ASSY		1
20	10008733		• • STRAP, ELASTIC		1
30	804650-01		• INSERT ASSY, INHALATION VALVE		1
40	174-57		• • FLAPPER NP		1
50	289-830-724-1A		• BAG ASSY WITH INDICATOR	A	1

- ITEM NOT ILLUSTRATED



FIG. ITEM	PART NUMBER	AIRLINE STOCK NO.	NOMENCLATURE 1234567	EFF. CODE	UNITS PER ASSY
4-					
-50A	289-830-724-2A		• BAG ASSY WITH INDICATOR	B	1
-50B	289-830-724-3A		• BAG ASSY WITH INDICATOR	C	1
-50C	289-830-724-4A		• BAG ASSY WITH INDICATOR	D	1
-50D	289-830-724-5A		• BAG ASSY WITH INDICATOR	E	1
-50E	289-830-724-6A		• BAG ASSY WITH INDICATOR	F	1
-50F	289-830-724-7A		• BAG ASSY WITH INDICATOR	G	1
-50G	289-830-724-8A		• BAG ASSY WITH INDICATOR	H	1
-50H	289-830-724-9A		• BAG ASSY WITH INDICATOR	J	1
-50J	289-830-724-10A		• BAG ASSY WITH INDICATOR	K	1
-50K	289-830-724-11A		• BAG ASSY WITH INDICATOR	L	1
-50L	289-830-724-12A		• BAG ASSY WITH INDICATOR	M	1
-50M	289-830-724-13A		• BAG ASSY WITH INDICATOR	N	1
-50N	289-830-724-14A		• BAG ASSY WITH INDICATOR	P	1
-50P	289-830-724-15A		• BAG ASSY WITH INDICATOR	Q	1
-50Q	289-830-724-16A		• BAG ASSY WITH INDICATOR	R	1
-50R	289-830-724-17A		• BAG ASSY WITH INDICATOR	S	1
-50S	289-830-724-18A		• BAG ASSY WITH INDICATOR	T	1
			ITEM NUMBERS 60 THRU 80 SKIPPED		
90	289-682-1		• LANYARD ASSY	A	1
90A	289-682-2		• LANYARD ASSY	G,L	1
90B	289-682-4		• LANYARD ASSY	C	1
90C	289-682-5		• LANYARD ASSY	J,Q	1
90D	289-682-6		• LANYARD ASSY	N	1
90E	289-682-7		• LANYARD ASSY	E,S	1
90F	289-682-8		• LANYARD ASSY	B	1
90G	289-682-9		• LANYARD ASSY	H,M	1
90H	289-682-11		• LANYARD ASSY	D	1
90J	289-682-12		• LANYARD ASSY	K,R	1
90K	289-682-13		• LANYARD ASSY	P	1
90L	289-682-14		• LANYARD ASSY	F,T	1
100	289-649-1		•• RING	A,C,E,G,J, L,N,Q,S	2
100A	289-649-1		•• RING	B,D,F,H,K, M,P,R,T	1
100B	289-686		•• RING	NP B,D,F,H,K, M,P,R,T	1

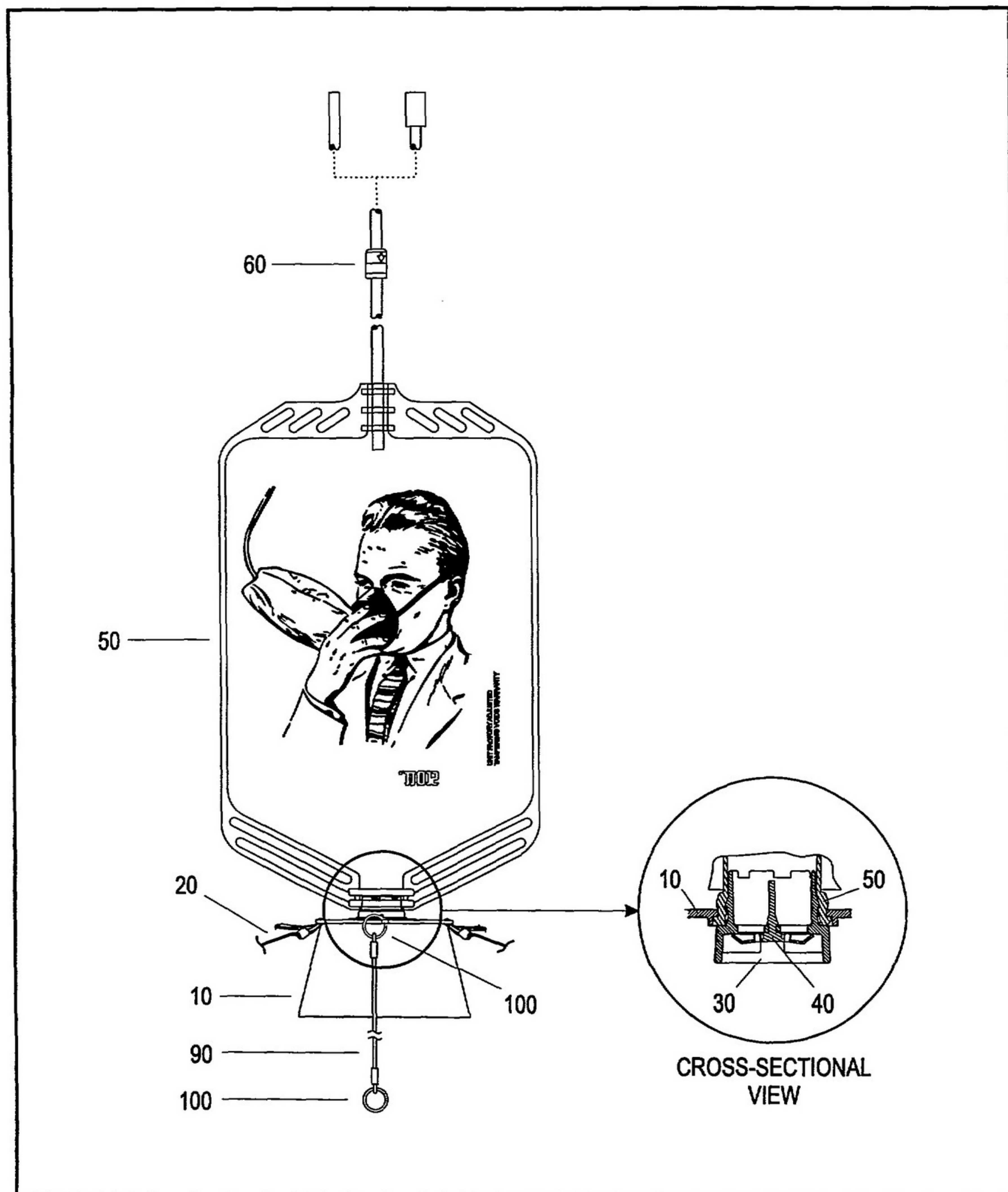
- ITEM NOT ILLUSTRATED



FIG. ITEM	PART NUMBER	AIRLINE STOCK NO.	NOMENCLATURE 1234567	EFF. CODE	UNITS PER ASSY
4-110	289-685		• • PIN, LANYARD	A,C,E,G,J, L,N,Q,S	1
-110A	444-12877-000-20		• • PIN, LANYARD OPT (VF0553) ITEM NUMBER 120 SKIPPED	A,C,E,G,J, L,N,Q,S	1
130	289-680-1		• STRINGER	L,M	1

- ITEM NOT ILLUSTRATED

**35-22-07**



Passenger Oxygen Mask Assembly  
Figure 5



FIG. ITEM	PART NUMBER	AIRLINE STOCK NO.	NOMENCLATURE 1234567	EFF. CODE	UNITS PER ASSY
5-					
-1	289-801-051		MASK ASSY, PASSENGER OXYGEN (BAC P/N S418W001-106)	A	RF
-1A	289-801-052		MASK ASSY, PASSENGER OXYGEN (BAC P/N S418W001-107)	B	RF
-1B	289-801-053		MASK ASSY, PASSENGER OXYGEN (BAC P/N S418W001-108)	C	RF
-1C	289-801-054		MASK ASSY, PASSENGER OXYGEN (BAC P/N S418W001-110)	D	RF
-1D	289-801-055		MASK ASSY, PASSENGER OXYGEN (BAC P/N S418W001-111)	E	RF
-1E	289-801-056		MASK ASSY, PASSENGER OXYGEN (BAC P/N S418W001-115)	F	RF
-1F	289-801-057		MASK ASSY, PASSENGER OXYGEN (BAC P/N S418W001-117)	G	RF
-1G	289-801-119		MASK ASSY, PASSENGER OXYGEN (BAC P/N S418W001-119)	H	RF
-1H	289-801-120		MASK ASSY, PASSENGER OXYGEN (BAC P/N S418W001-120)	J	RF
-1J	289-801-121		MASK ASSY, PASSENGER OXYGEN (BAC P/N S418W001-121)	K	
-1K	289-801-122		MASK ASSY, PASSENGER OXYGEN (BAC P/N S418W001-122)	L	
-1L	289-801-236		MASK ASSY, PASSENGER OXYGEN (BAC P/N S418W001-105)	M	RF
-1M	289-801-237		MASK ASSY, PASSENGER OXYGEN (BAC P/N S418W001-104)	N	RF
-1N	289-801-240		MASK ASSY, PASSENGER OXYGEN (BAC P/N S418W001-100)	P	RF
10	804256-01		• FACEPIECE ASSY		1
20	10008733		• • STRAP, ELASTIC		1
30	804650-01		• INSERT ASSY, INHALATION VALVE		1
40	174-57		• • FLAPPER	NP	1
50	289-830-051		• BAG ASSY WITH INDICATOR	A	1
-50A	289-830-052		• BAG ASSY WITH INDICATOR	B	1
-50B	289-830-053		• BAG ASSY WITH INDICATOR	C	1
-50C	289-830-054		• BAG ASSY WITH INDICATOR	D	1
-50D	289-830-055		• BAG ASSY WITH INDICATOR	E	1
-50E	289-830-056		• BAG ASSY WITH INDICATOR	F	1
-50F	289-830-057		• BAG ASSY WITH INDICATOR	G	1
-50G	289-830-119		• BAG ASSY WITH INDICATOR	H	1

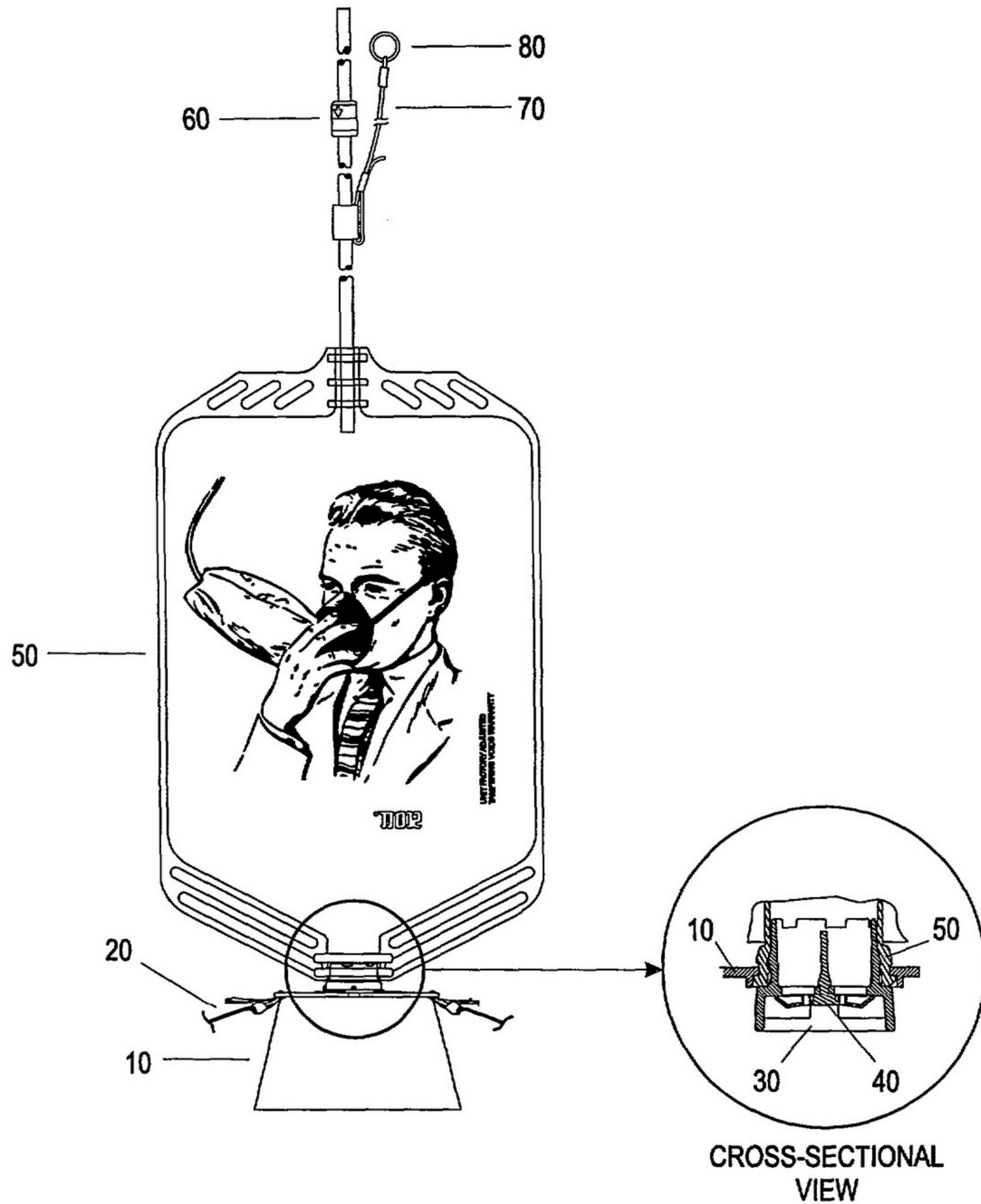
- ITEM NOT ILLUSTRATED

FIG. ITEM	PART NUMBER	AIRLINE STOCK NO.	NOMENCLATURE 1234567	EFF. CODE	UNITS PER ASSY
5-					
-50H	289-830-120		• BAG ASSY WITH INDICATOR	J	1
-50J	289-830-121		• BAG ASSY WITH INDICATOR	K	
-50K	289-830-122		• BAG ASSY WITH INDICATOR	L	
-50L	289-830-236		• BAG ASSY WITH INDICATOR	M	1
-50M	289-830-237		• BAG ASSY WITH INDICATOR	N	1
-50N	289-830-240		• BAG ASSY WITH INDICATOR	P	1
60	804273-01		• • INDICATOR, FLOW		1
			ITEM NUMBERS 70 THRU 80 SKIPPED		
90	804876-02		• LANYARD ASSY	J	1
-90A	804876-03		• LANYARD ASSY	B,F	1
-90B	804876-05		• LANYARD ASSY	M	1
-90C	804876-08		• LANYARD ASSY	H,P	1
-90D	804876-09		• LANYARD ASSY	C,E,K,L	1
-90E	804876-14		• LANYARD ASSY	D,G	1
-90F	804876-20		• LANYARD ASSY	A	1
-90G	804876-21		• LANYARD ASSY	N	1
100	10010032		• • RING		2

- ITEM NOT ILLUSTRATED



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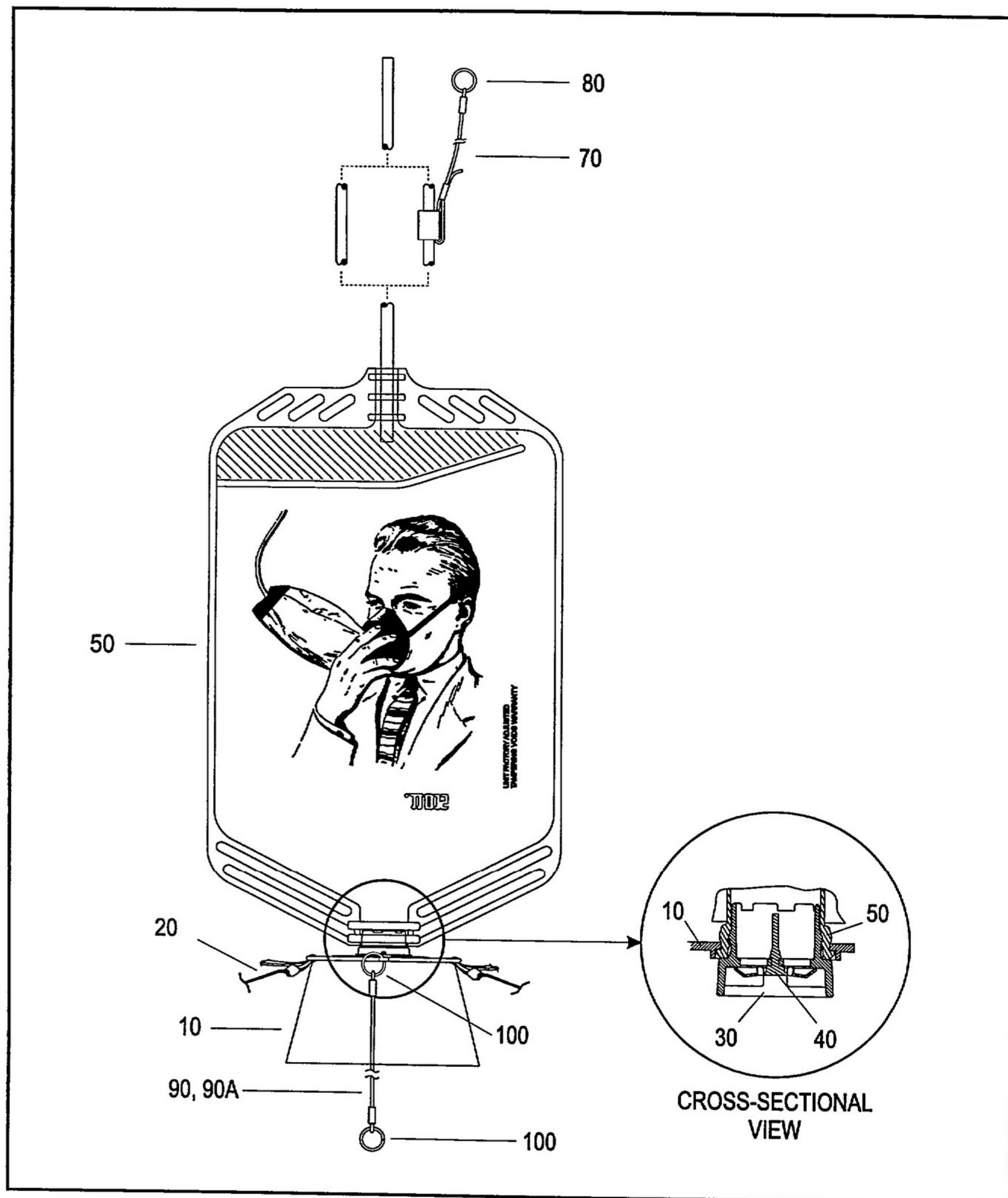


Passenger Oxygen Mask Assembly  
Figure 6



FIG. ITEM	PART NUMBER	AIRLINE STOCK NO.	NOMENCLATURE 1234567	EFF. CODE	UNITS PER ASSY
6-					
-1	289-801-058		MASK ASSY, PASSENGER OXYGEN (BAC P/N S418W001-112)	A	RF
-1A	289-801-059		MASK ASSY, PASSENGER OXYGEN (BAC P/N S418W001-114)	B	RF
-1B	289-801-238		MASK ASSY, PASSENGER OXYGEN (BAC P/N S418W001-102)	C	RF
-1C	289-801-239		MASK ASSY, PASSENGER OXYGEN (BAC P/N S418W001-103)	D	RF
-1D	289-801-241		MASK ASSY, PASSENGER OXYGEN (BAC P/N S418W001-101)	E	RF
10	804256-01		• FACEPIECE ASSY		1
20	10008733		•• STRAP, ELASTIC		1
30	804650-01		• INSERT ASSY, INHALATION VALVE		1
40	174-57		•• FLAPPER	NP	1
50	289-830-058		• BAG ASSY, INDICATOR & LANYARD	A	1
-50A	289-830-059		• BAG ASSY, INDICATOR & LANYARD	B	1
-50B	289-830-238		• BAG ASSY, INDICATOR & LANYARD	C	1
-50C	289-830-239		• BAG ASSY, INDICATOR & LANYARD	D	1
-50D	289-830-241		• BAG ASSY, INDICATOR & LANYARD	E	1
60	804273-01		•• INDICATOR, FLOW		1
70	804909-02		•• LANYARD ASSY	NP	1
-70A	804909-03		•• LANYARD ASSY	NP	1
-70B	804909-04		•• LANYARD ASSY	NP	1
-70C	804909-05		•• LANYARD ASSY	NP	1
-70D	804909-07		•• LANYARD ASSY	NP	1
80	10010032		••• RING, SPLIT		1

- ITEM NOT ILLUSTRATED



### Passenger Oxygen Mask Assembly Figure 7



FIG. ITEM	PART NUMBER	AIRLINE STOCK NO.	NOMENCLATURE 1234567	EFF. CODE	UNITS PER ASSY
7-					
-1	289-801-060		MASK ASSY, PASSENGER OXYGEN (BAC P/N S418W001-109)	A	RF
-1A	289-801-061		MASK ASSY, PASSENGER OXYGEN (BAC P/N S418W001-113)	B	RF
-1B	289-801-062		MASK ASSY, PASSENGER OXYGEN (BAC P/N S418W001-116)	C	RF
-1C	289-801-063		MASK ASSY, PASSENGER OXYGEN (BAC P/N S418W001-118)	D	RF
10	804256-01		• FACEPIECE ASSY		1
20	10008733		•• STRAP, ELASTIC		1
30	804650-01		• INSERT ASSY, INHALATION VALVE		1
40	174-57		•• FLAPPER	NP	1
50	289-830-060		• BAG ASSY, INDICATOR & LANYARD	A	1
-50A	289-830-061		• BAG ASSY, INDICATOR & LANYARD	B	1
-50B	289-830-062		• BAG ASSY, INDICATOR & LANYARD	C	1
-50C	289-830-063		• BAG ASSY, INDICATOR & LANYARD	D	1
			ITEM NUMBER 60 SKIPPED		
70	804909-05		•• LANYARD ASSY	NP	1
80	10010032		••• RING	D	1
90	804876-03		• LANYARD ASSY	B	1
90A	804876-14		• LANYARD ASSY	A,C	1
100	10010032		•• RING		2

- ITEM NOT ILLUSTRATED